

Fig. 1

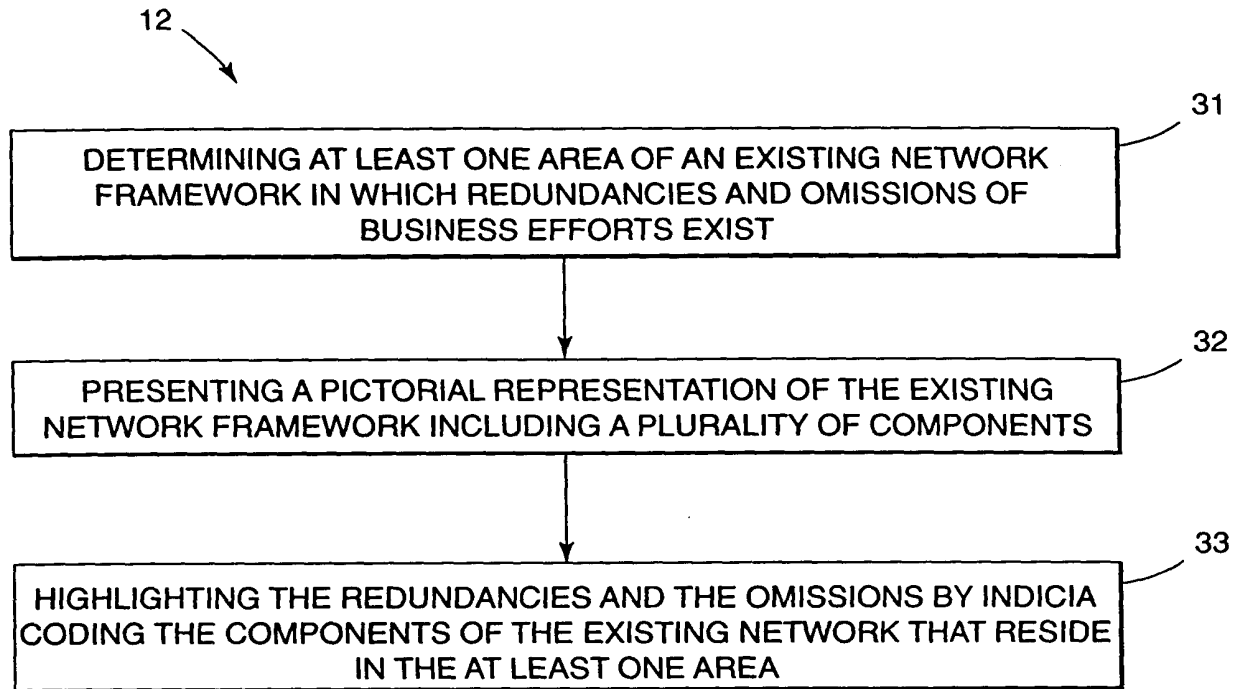


Fig. 2

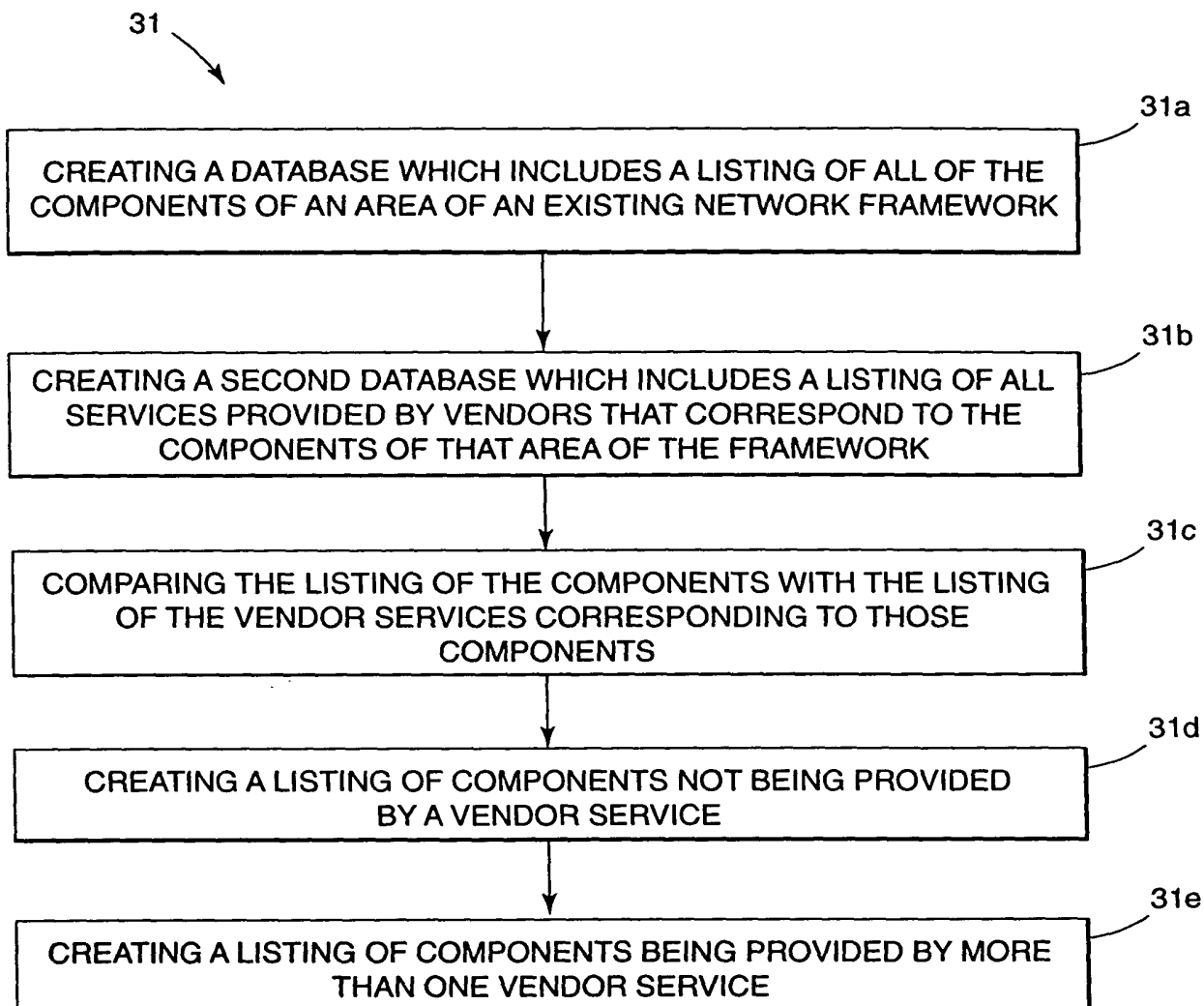


Fig. 3

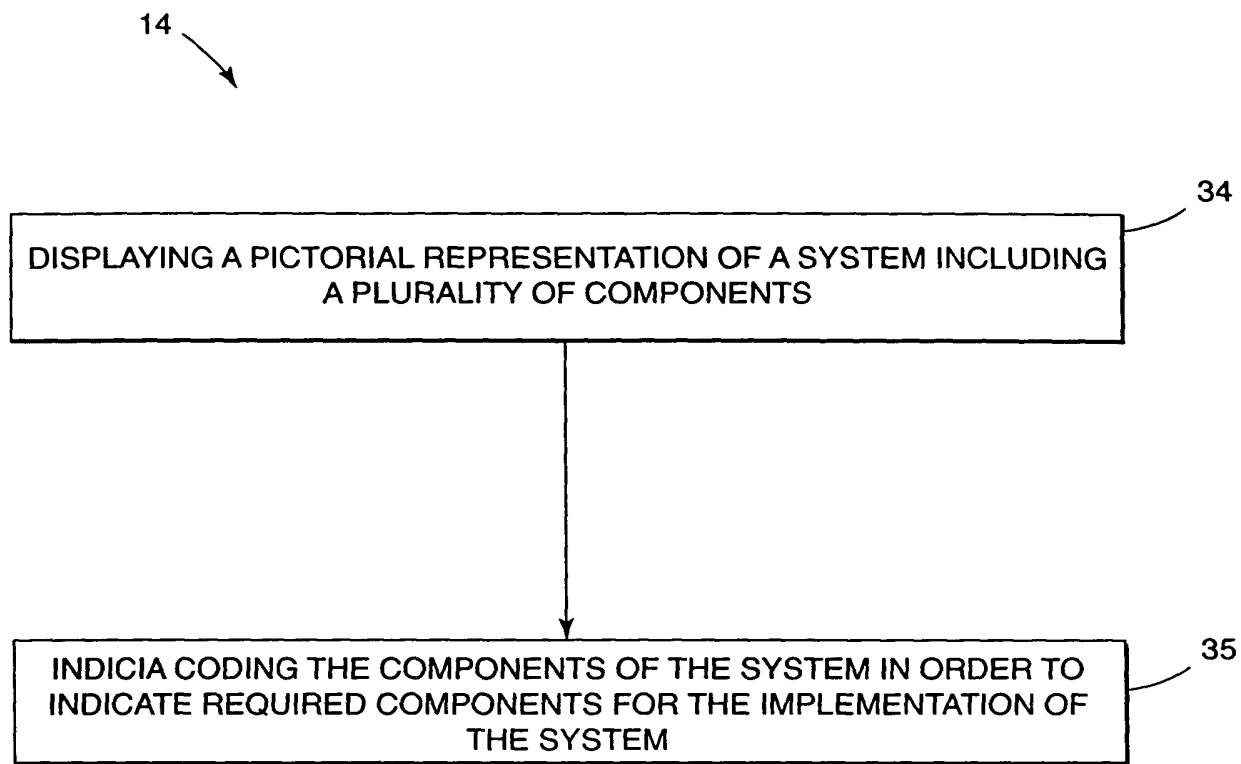


Fig. 4

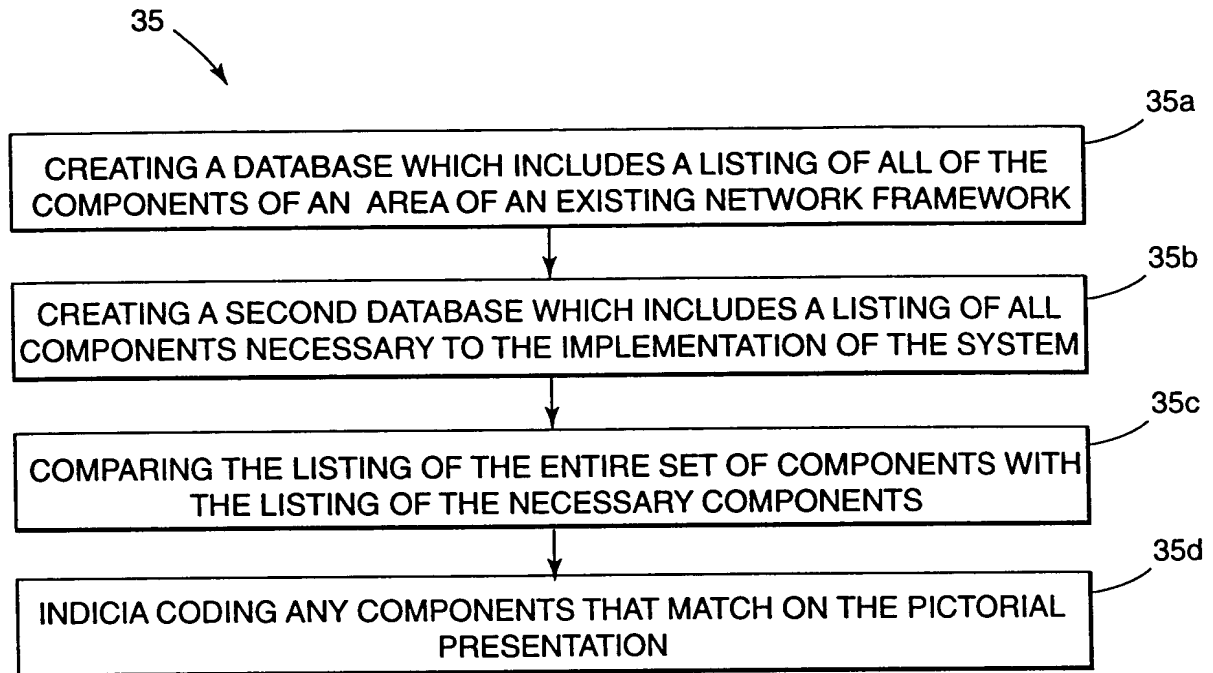


Fig. 5

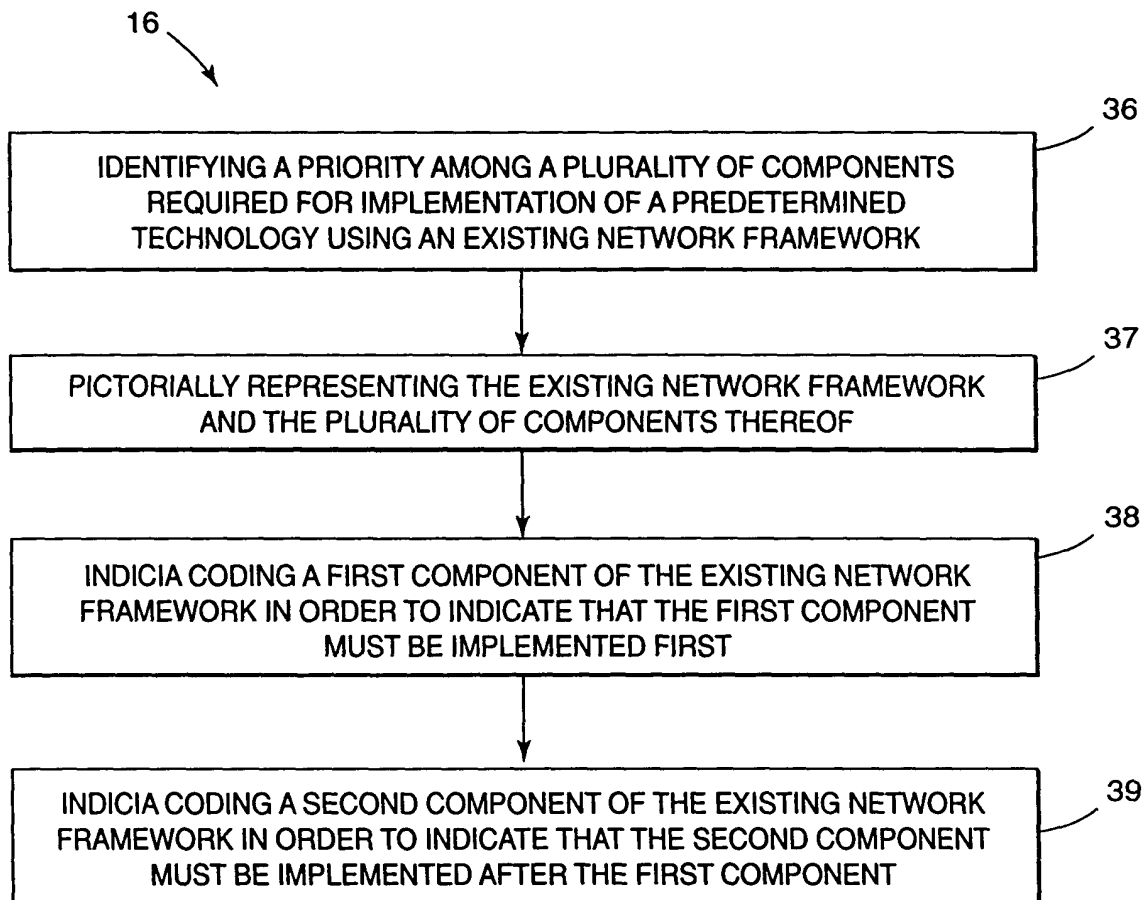


Fig. 6

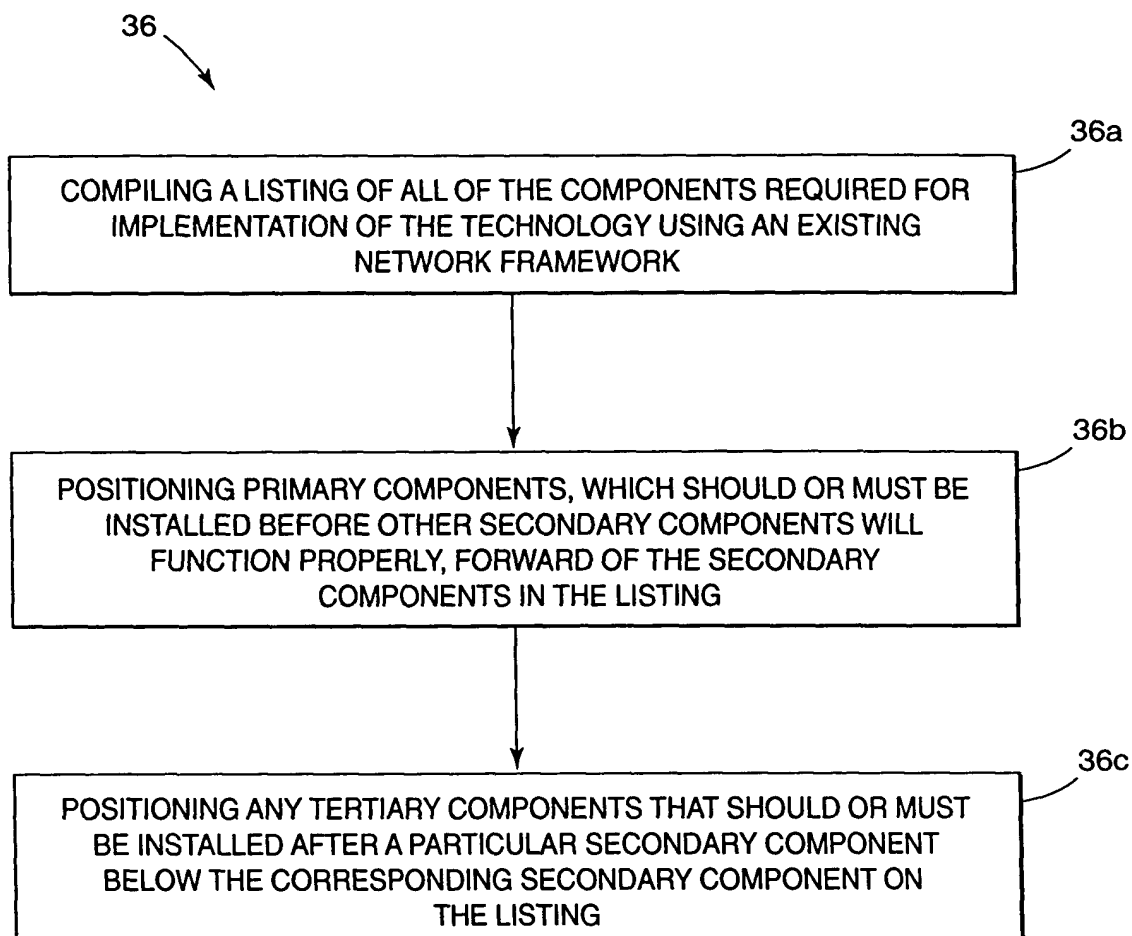


Fig. 7

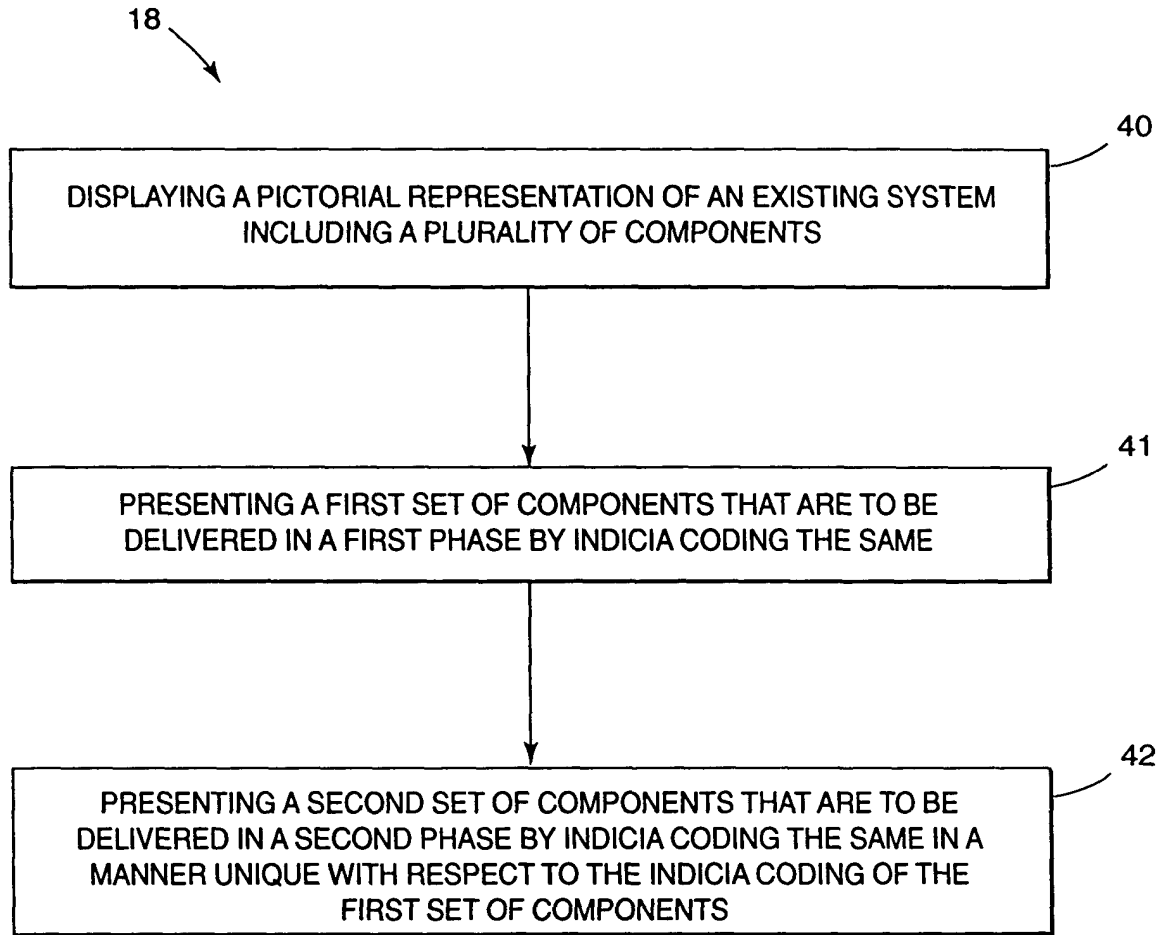


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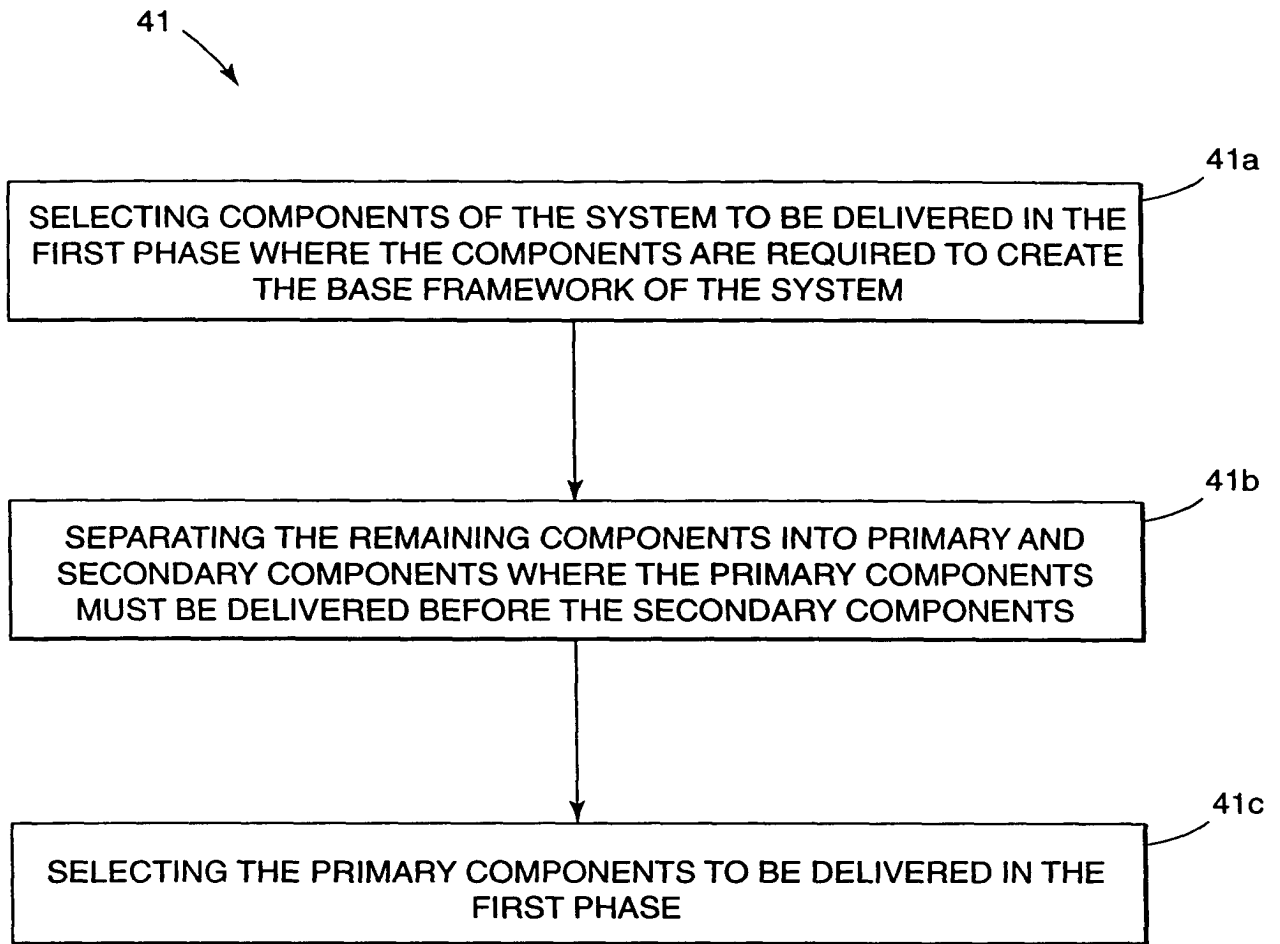


Fig. 9

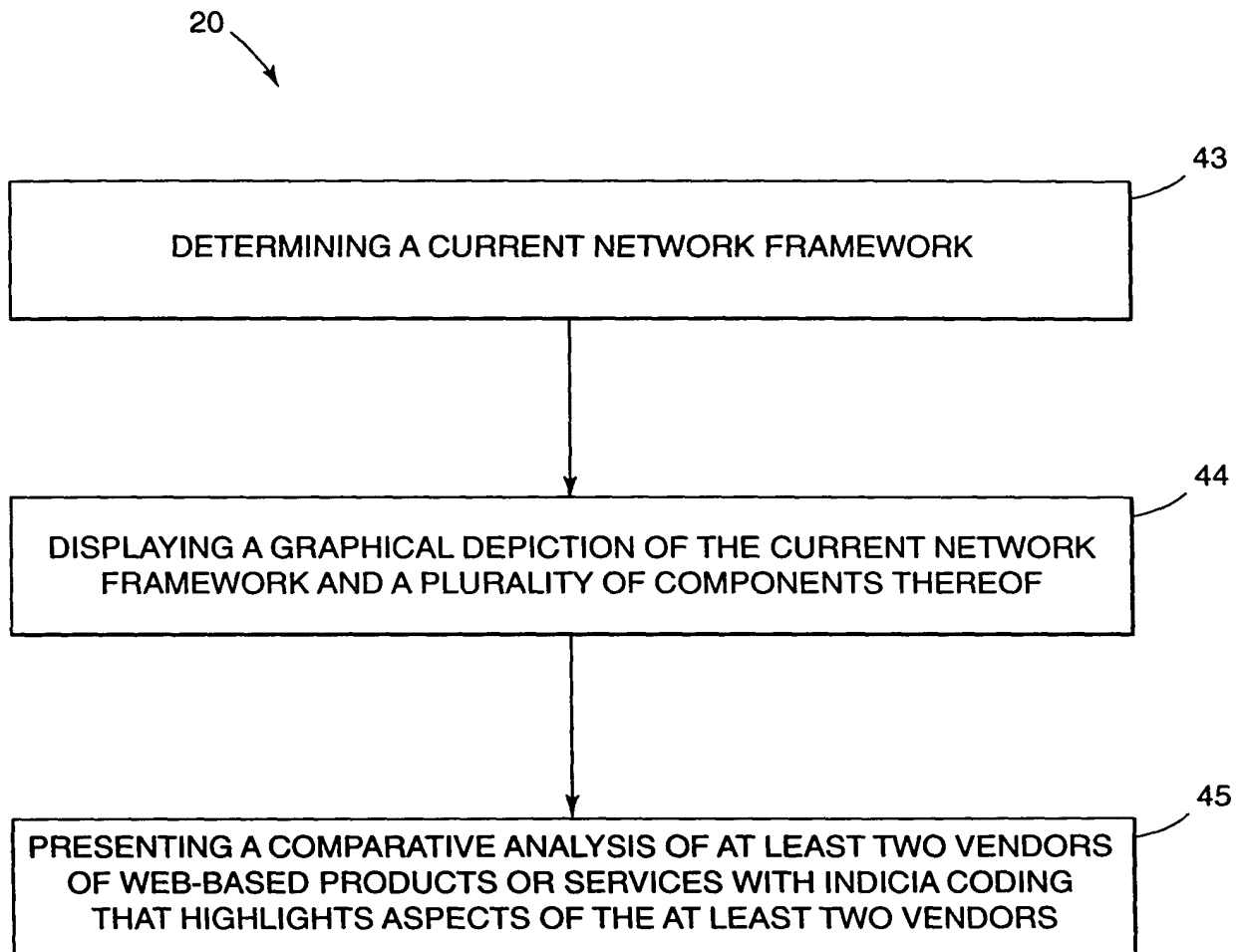


Fig. 10

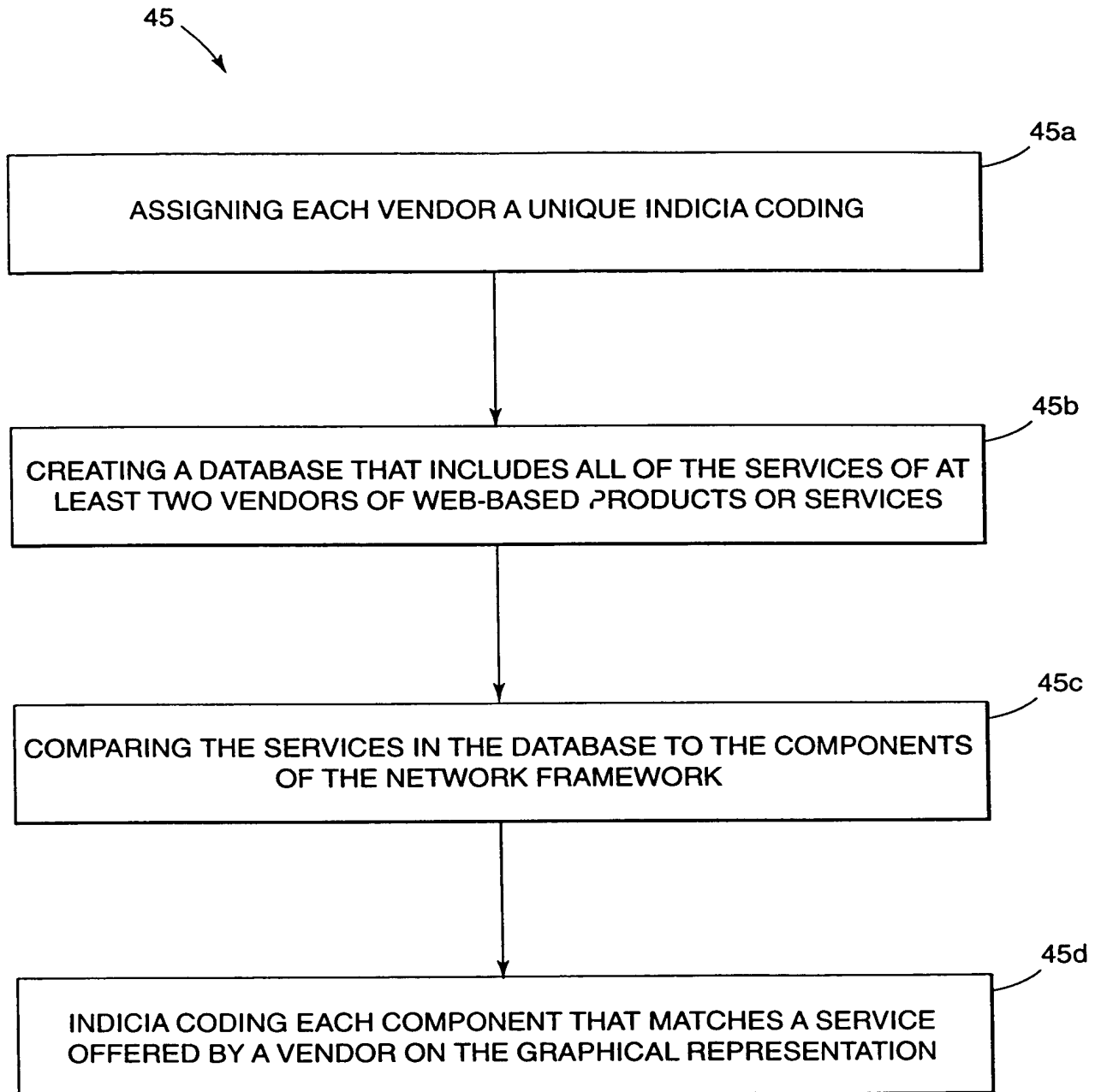


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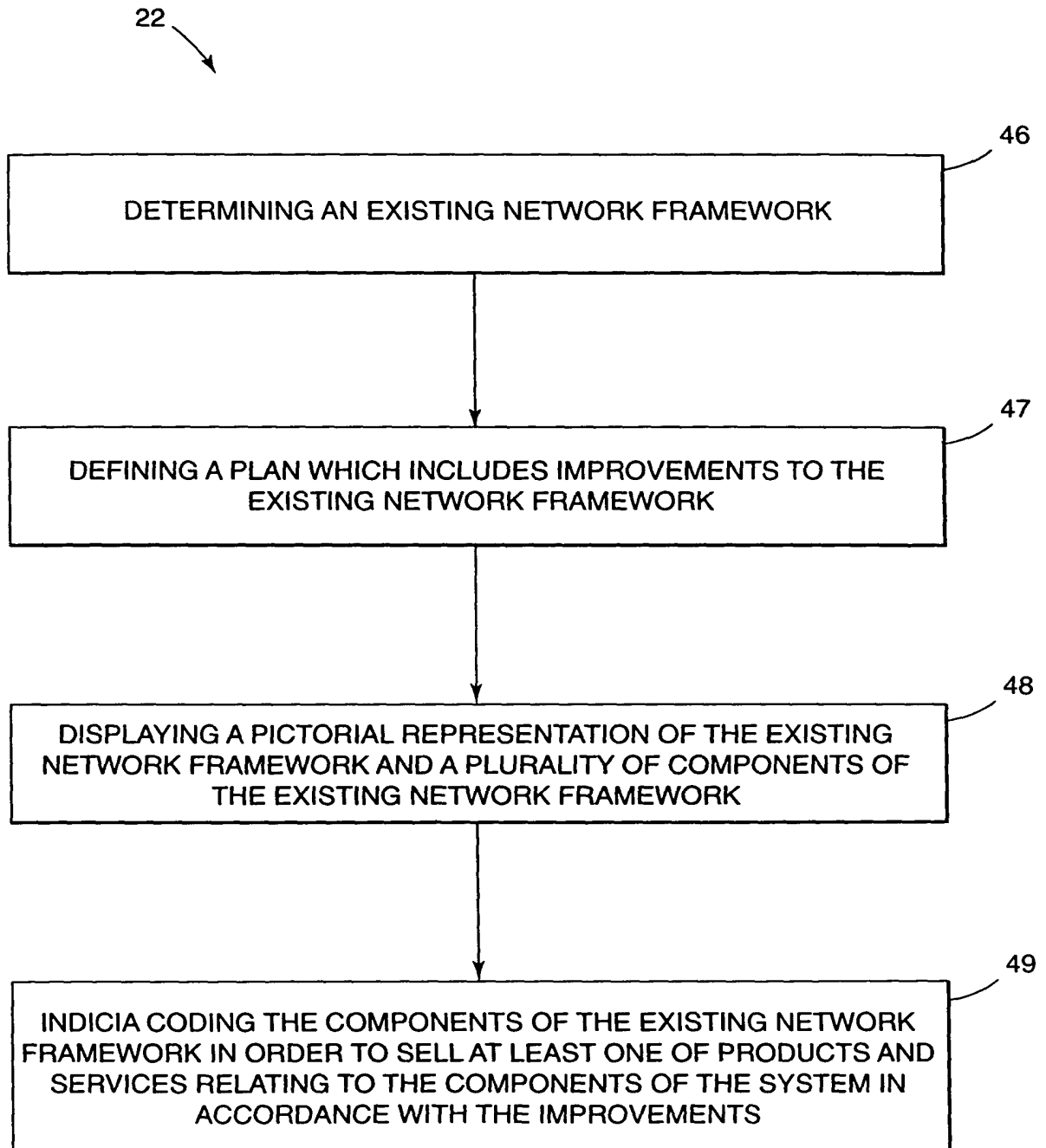


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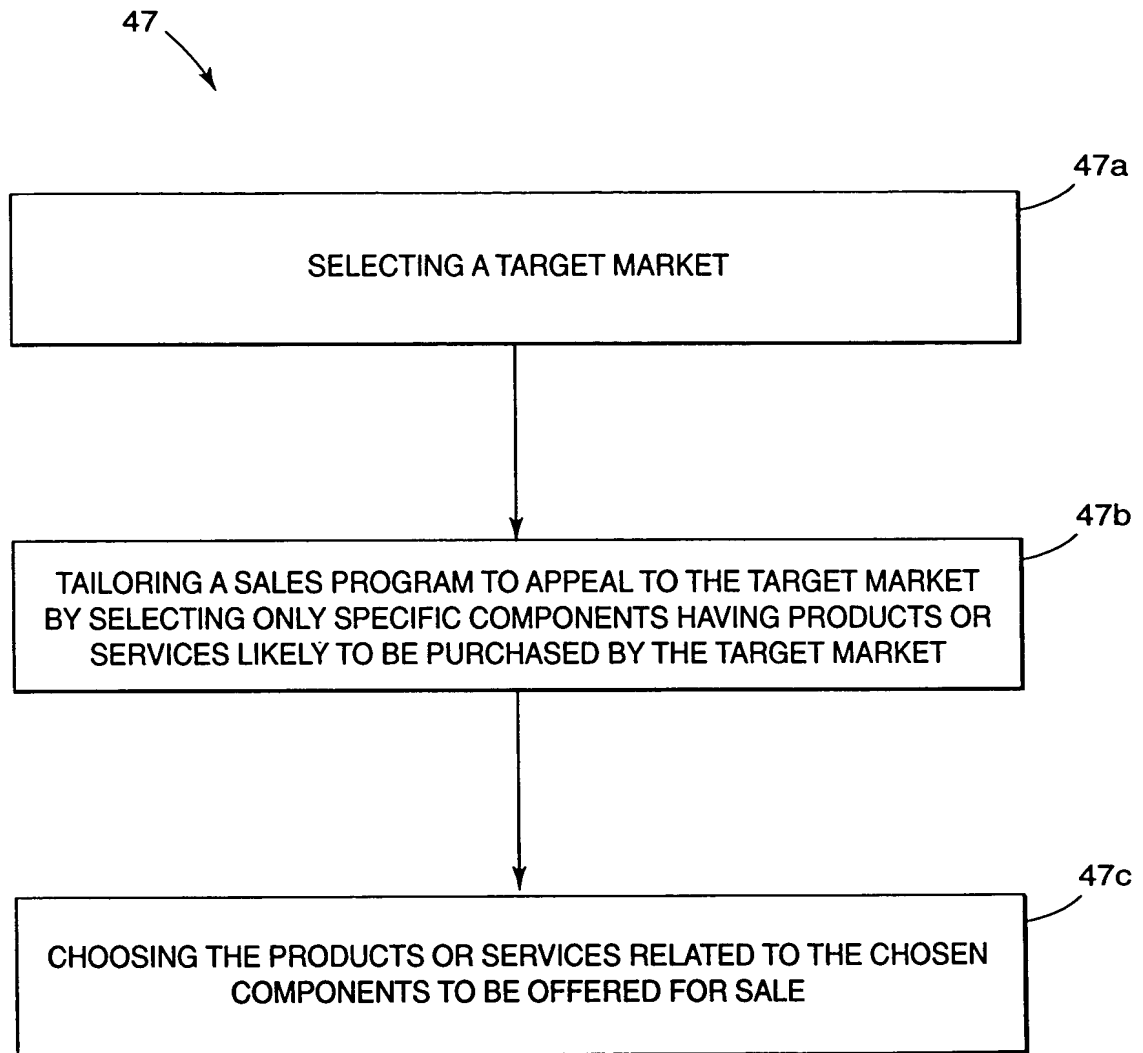
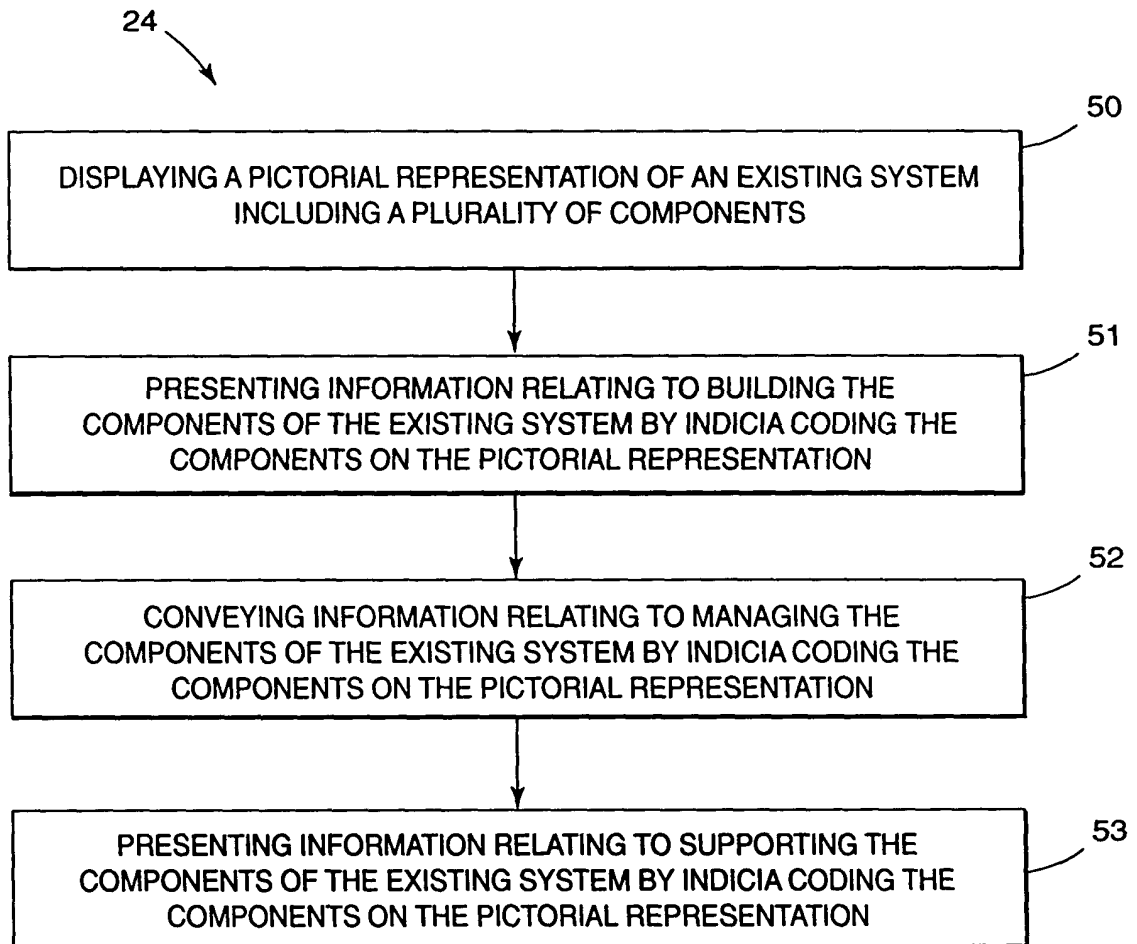


Fig. 13

*Fig. 14*

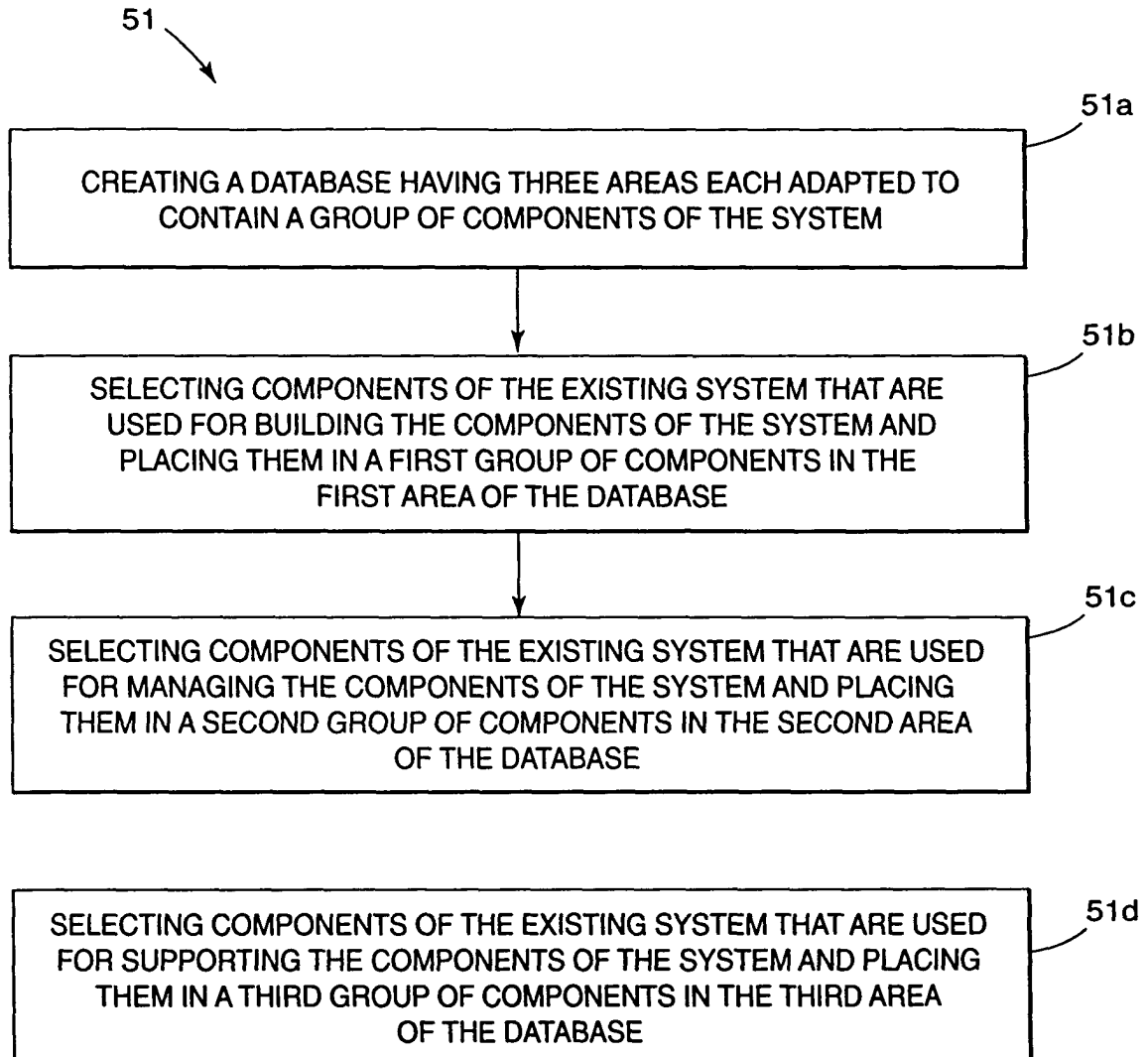


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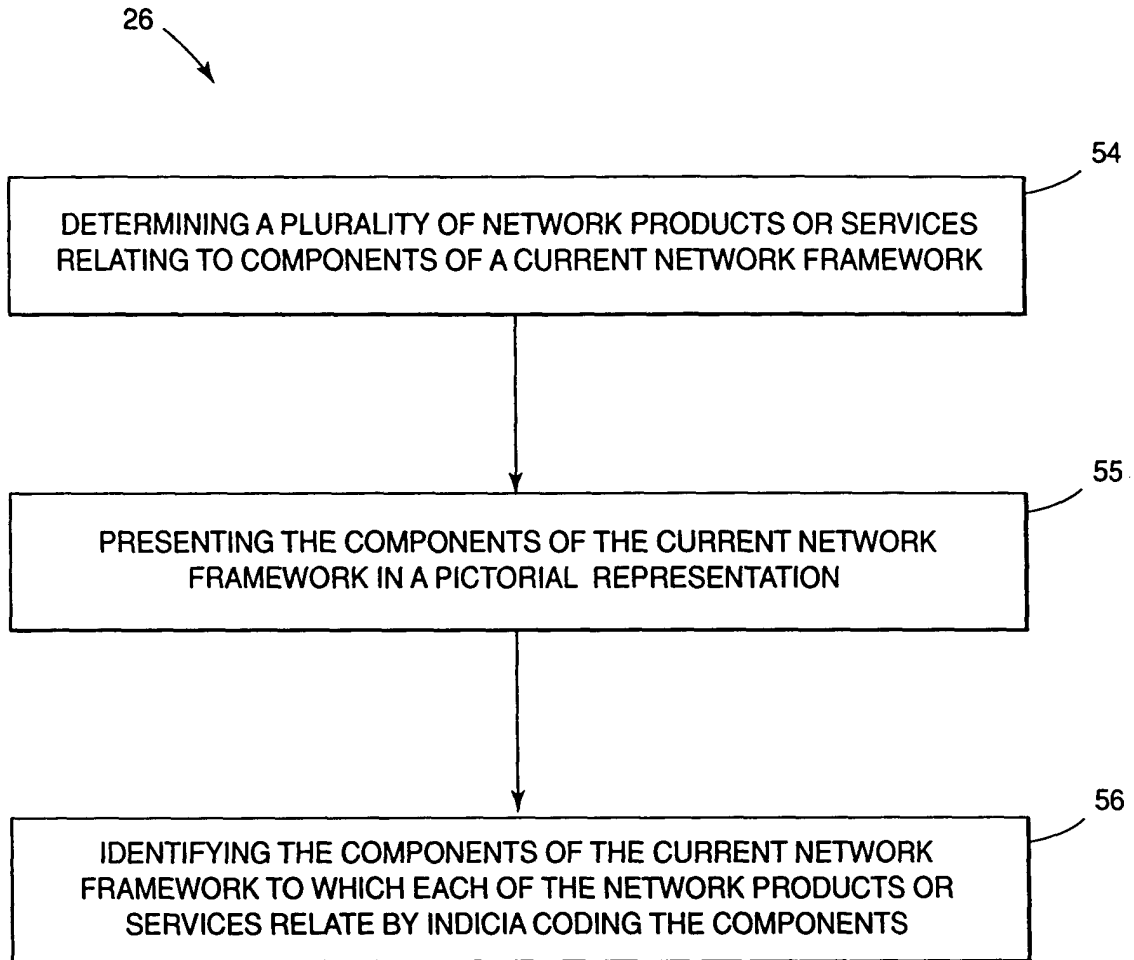


Fig. 16

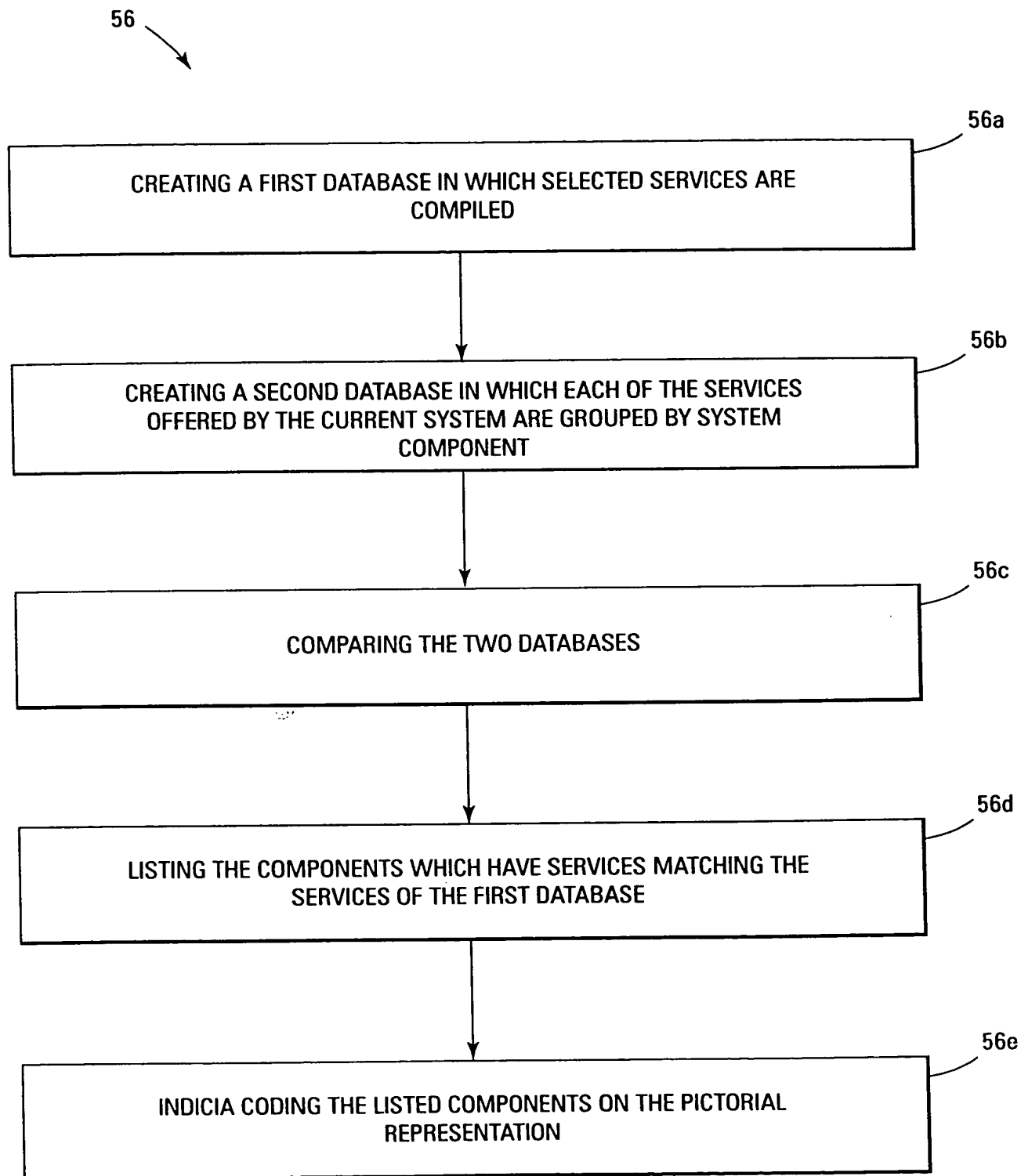


Fig. 17

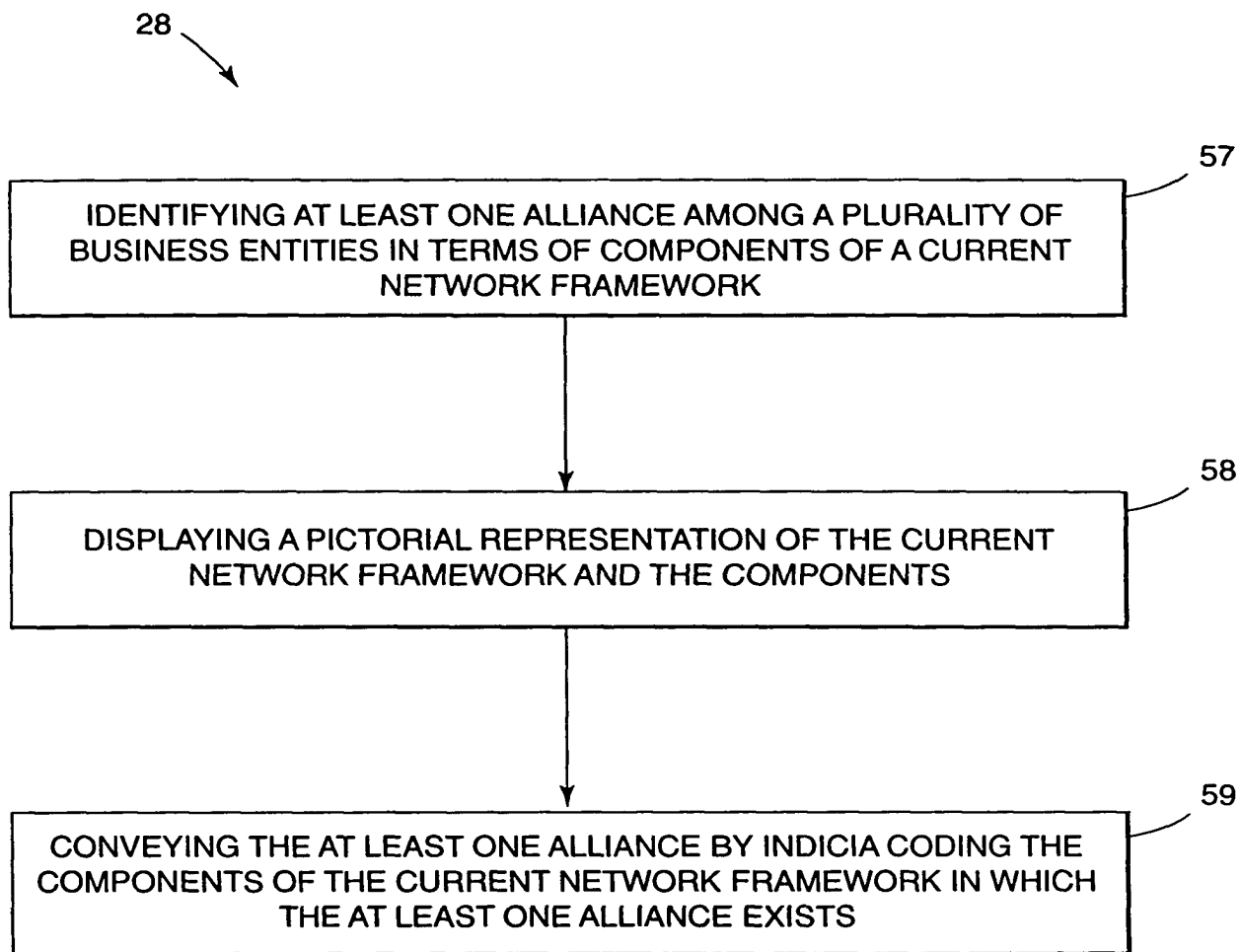


Fig. 18

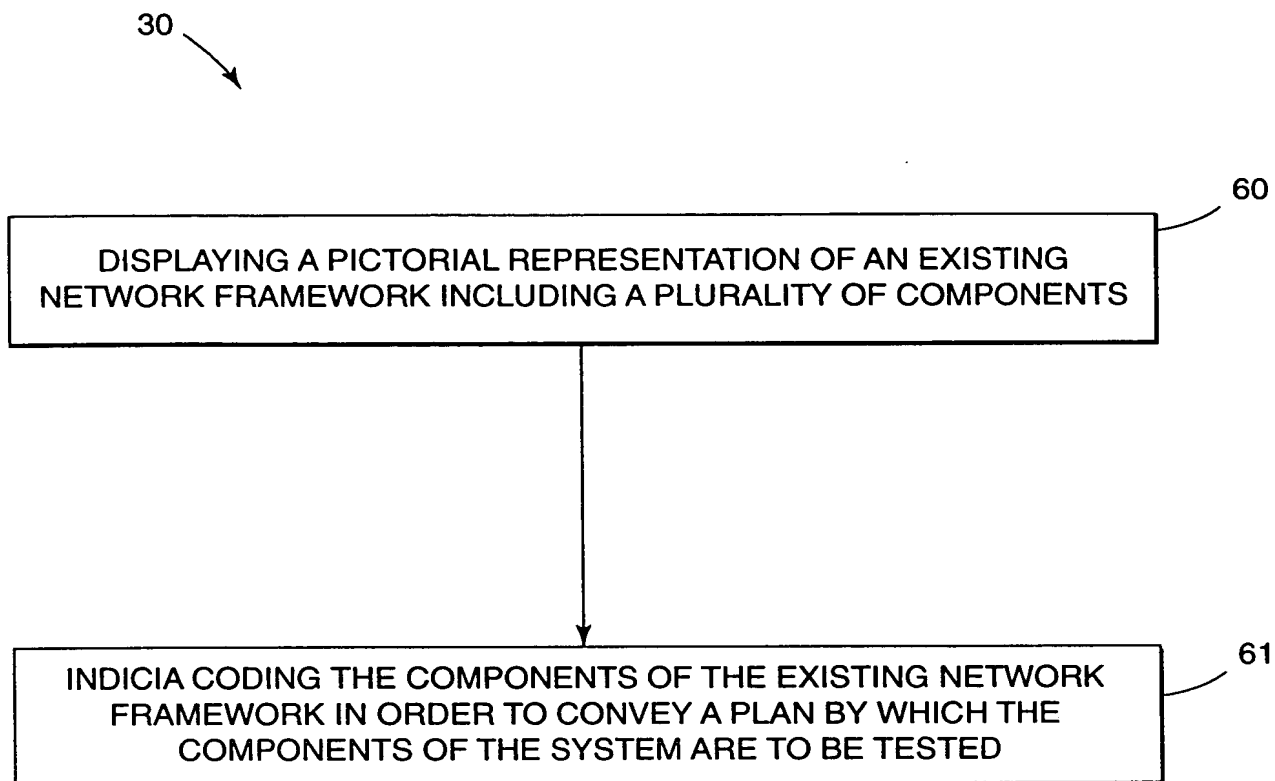


Fig. 19

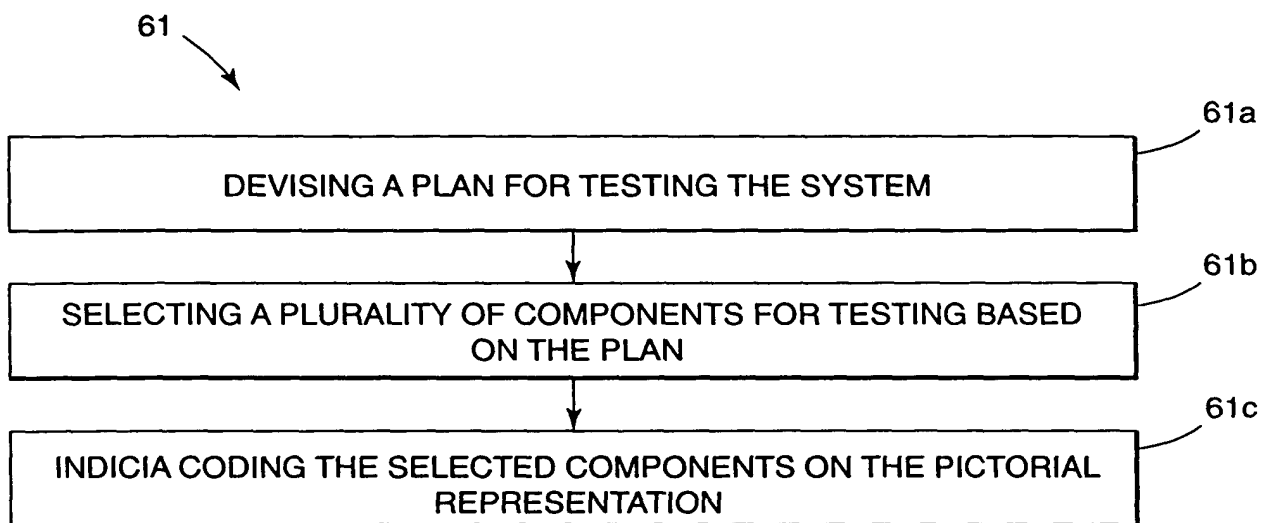
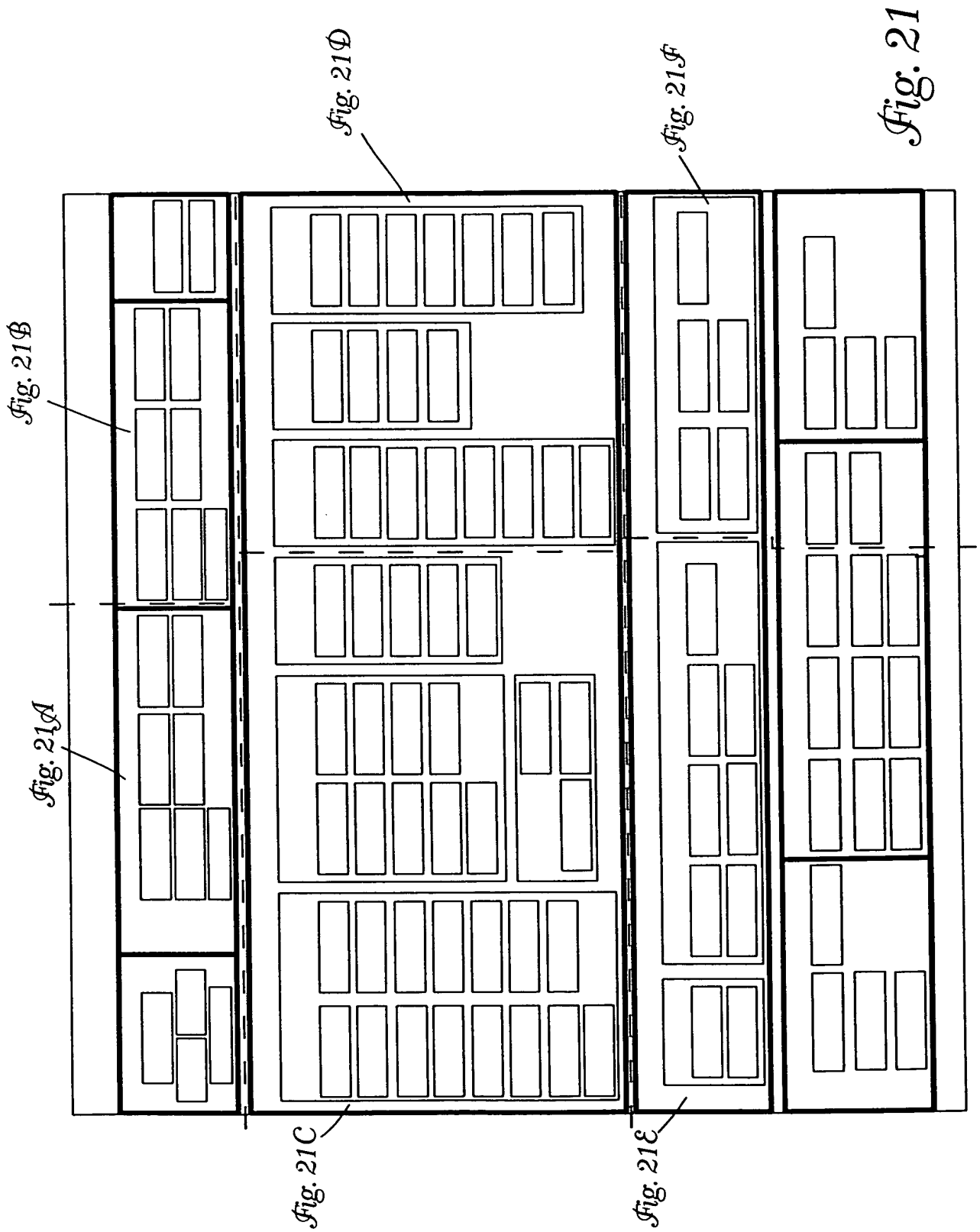


Fig. 20



Web Architecture Framework Base Chart

Security Services

Browser Based
Authentication

Web
Application
Entitlement

Web Data
Entitlement

Virtual Private Networks

Network Services

Web Content Caching

Network Object Mgmt

Application Proxy
Services

Quality of Service
(bandwidth)

Load Balancing

Remote Access
Services
(RADIUS)

Firewall Service

Fig. 21A

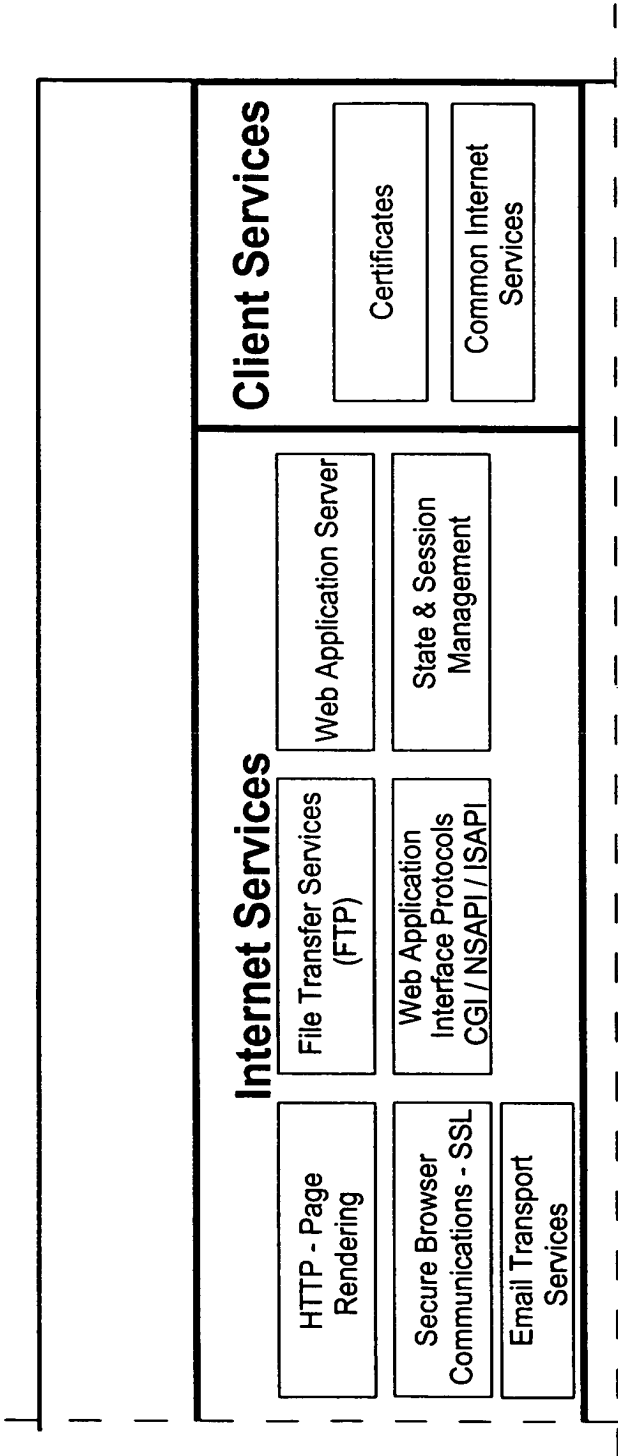


Fig. 21B

Web Application Services

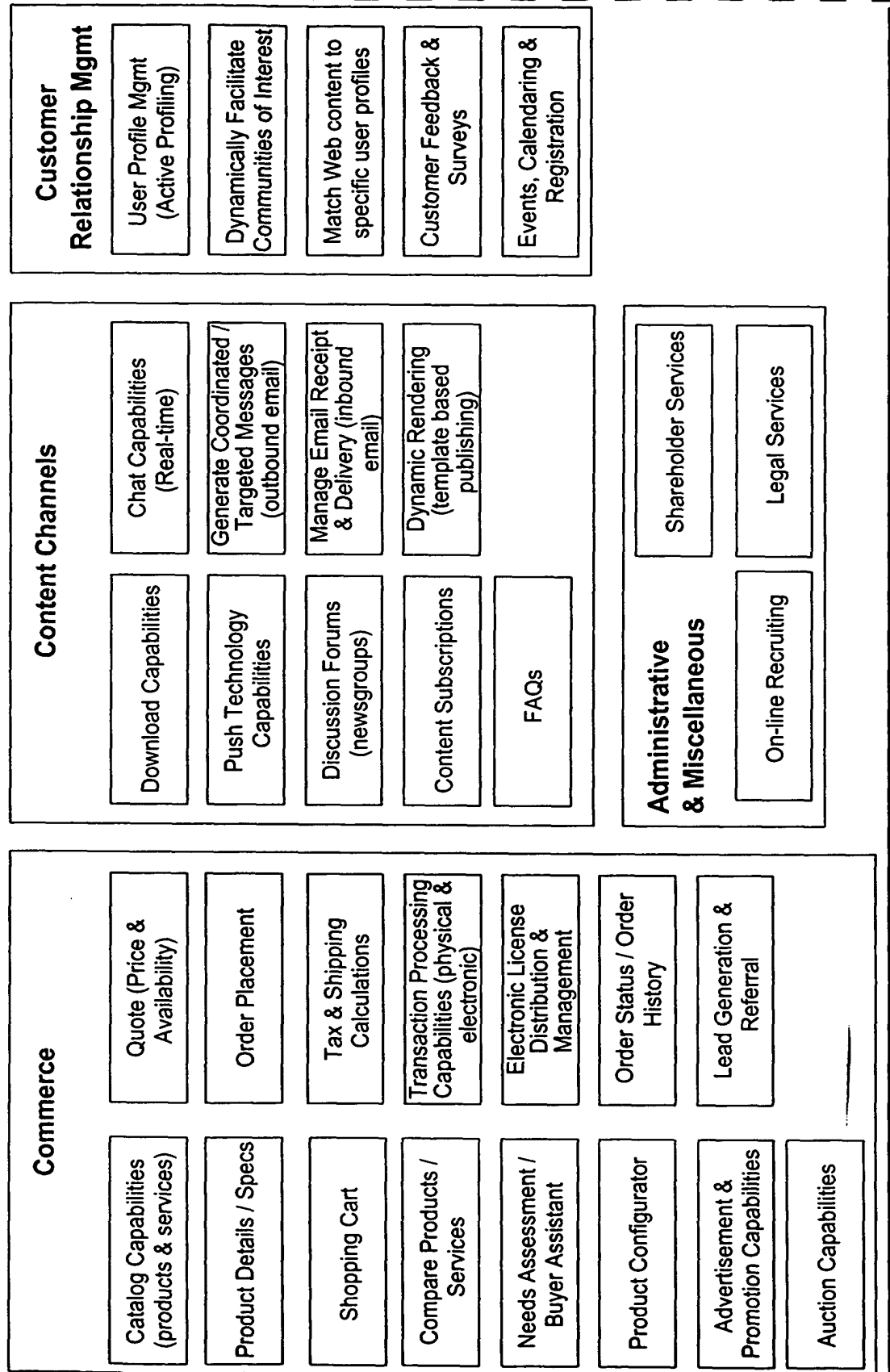


Fig. 21C

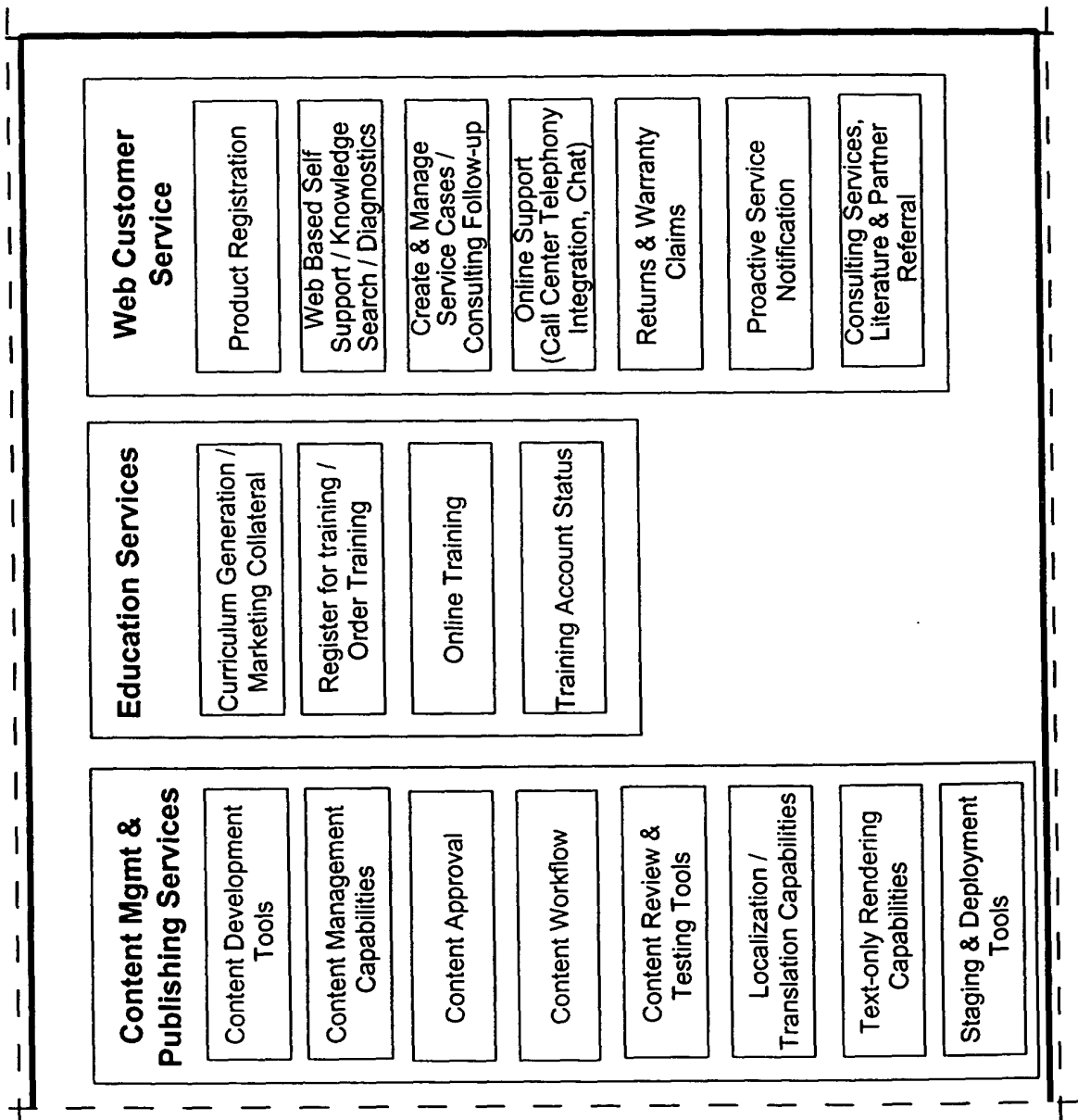


Fig. 21D

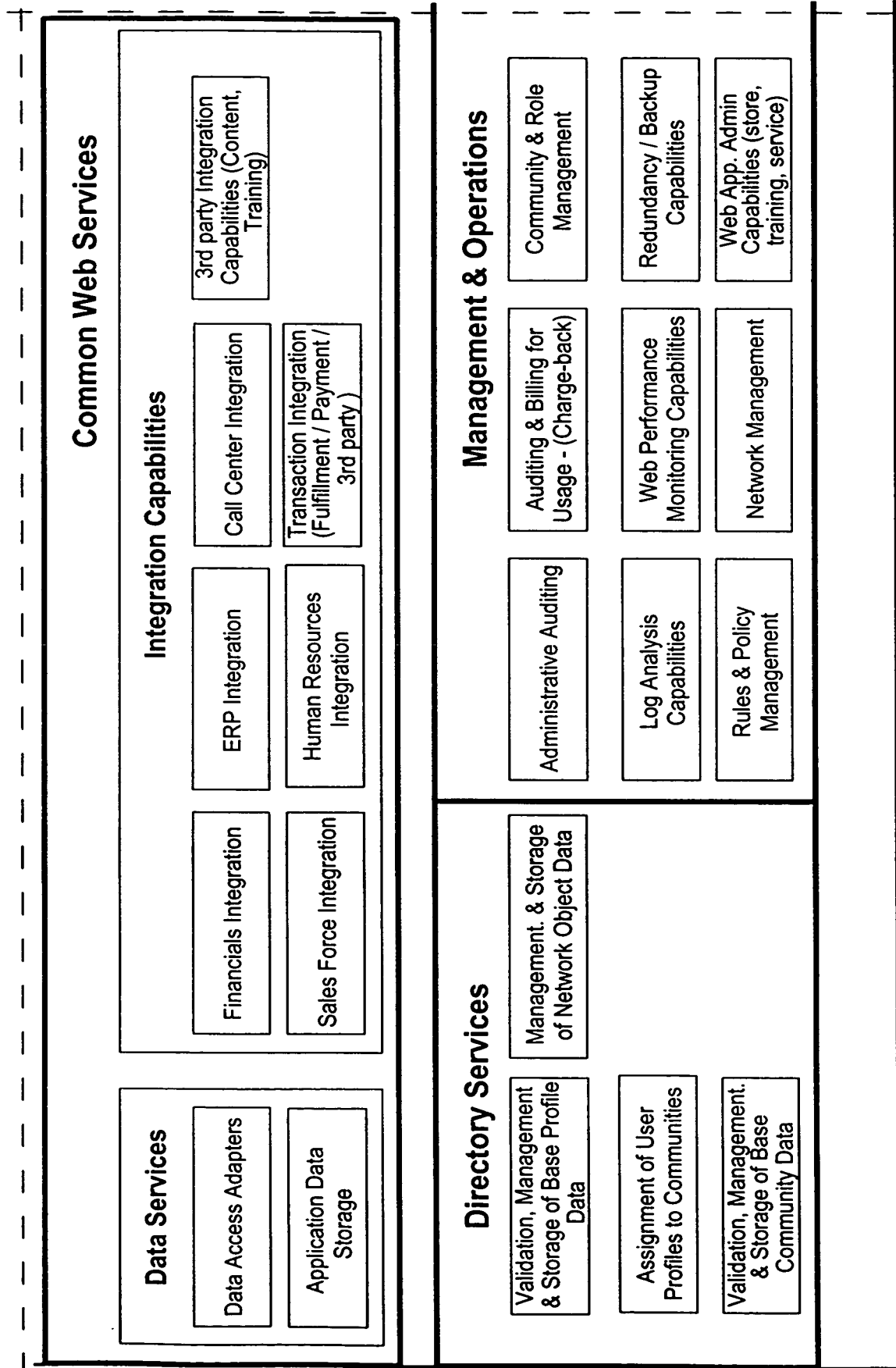


Fig. 21E

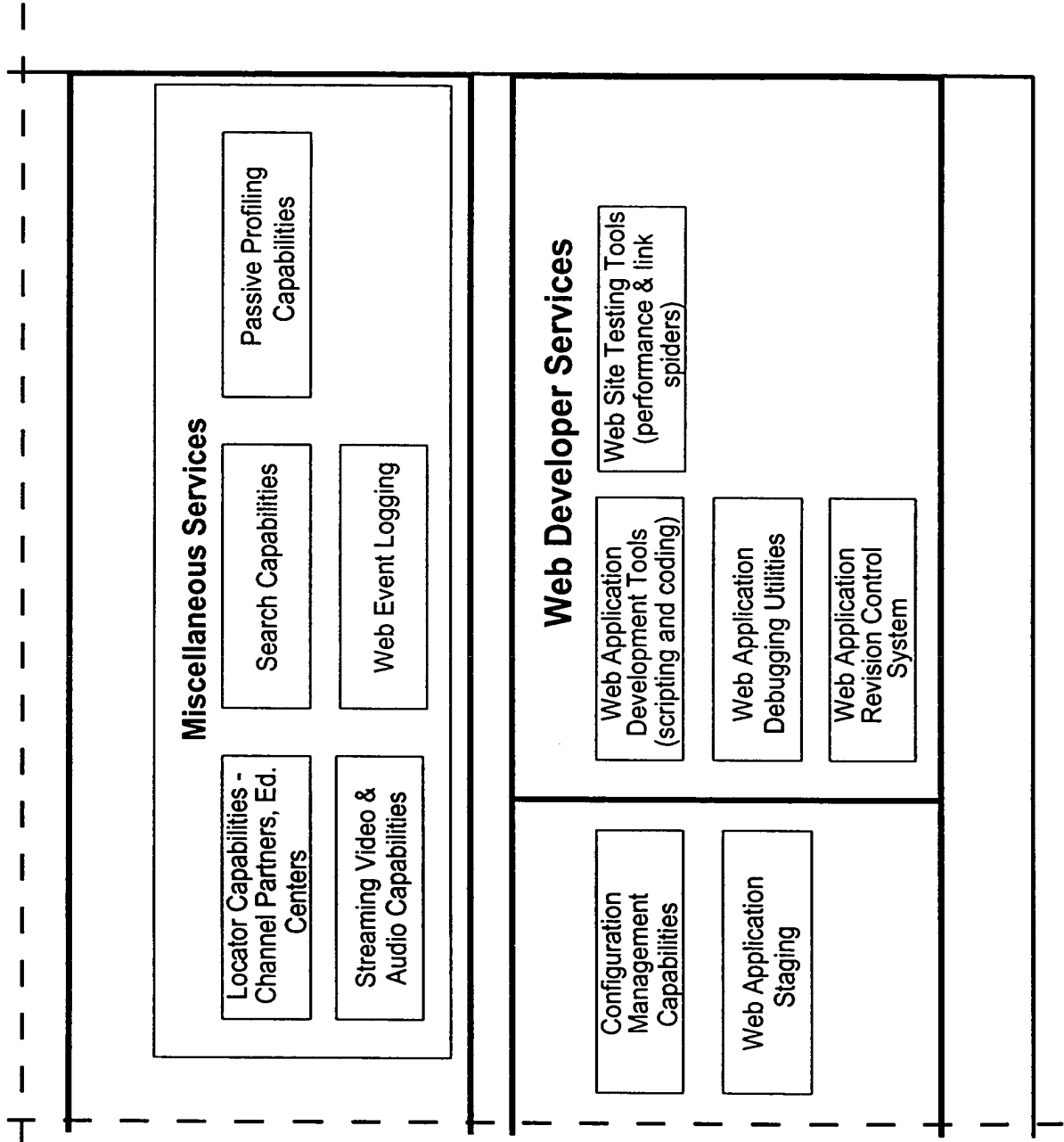


Fig. 21f

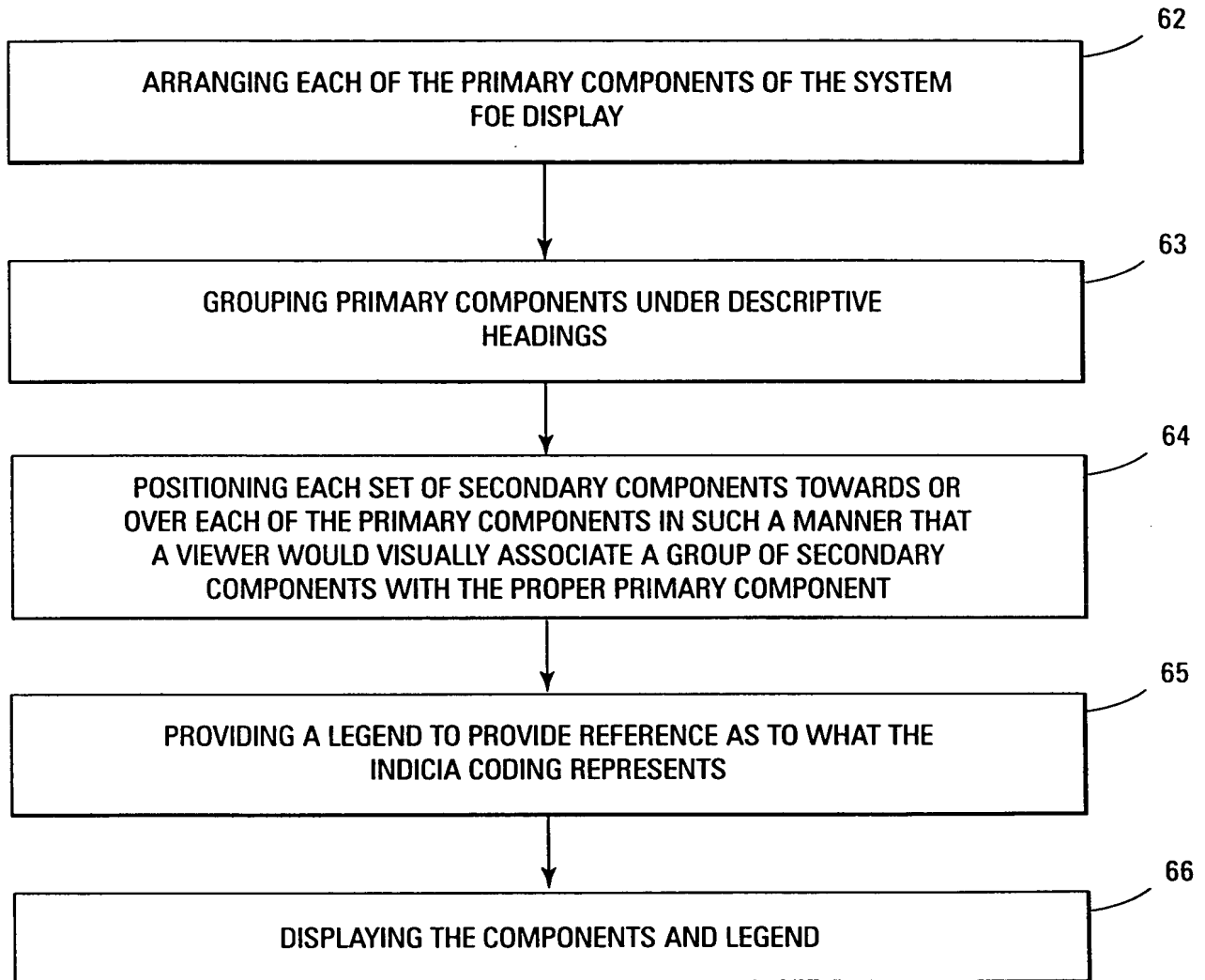


Fig. 22

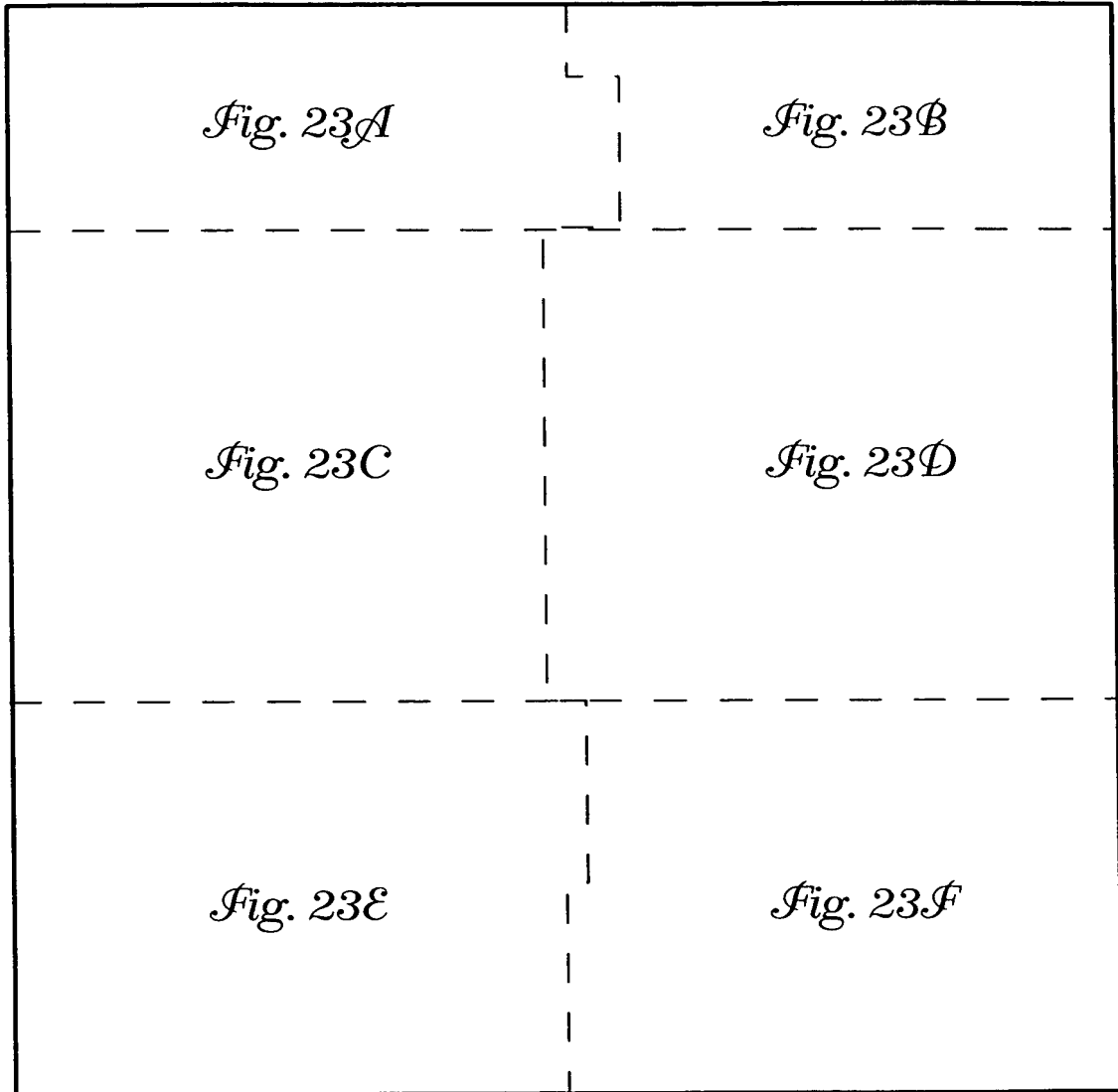


Fig. 23

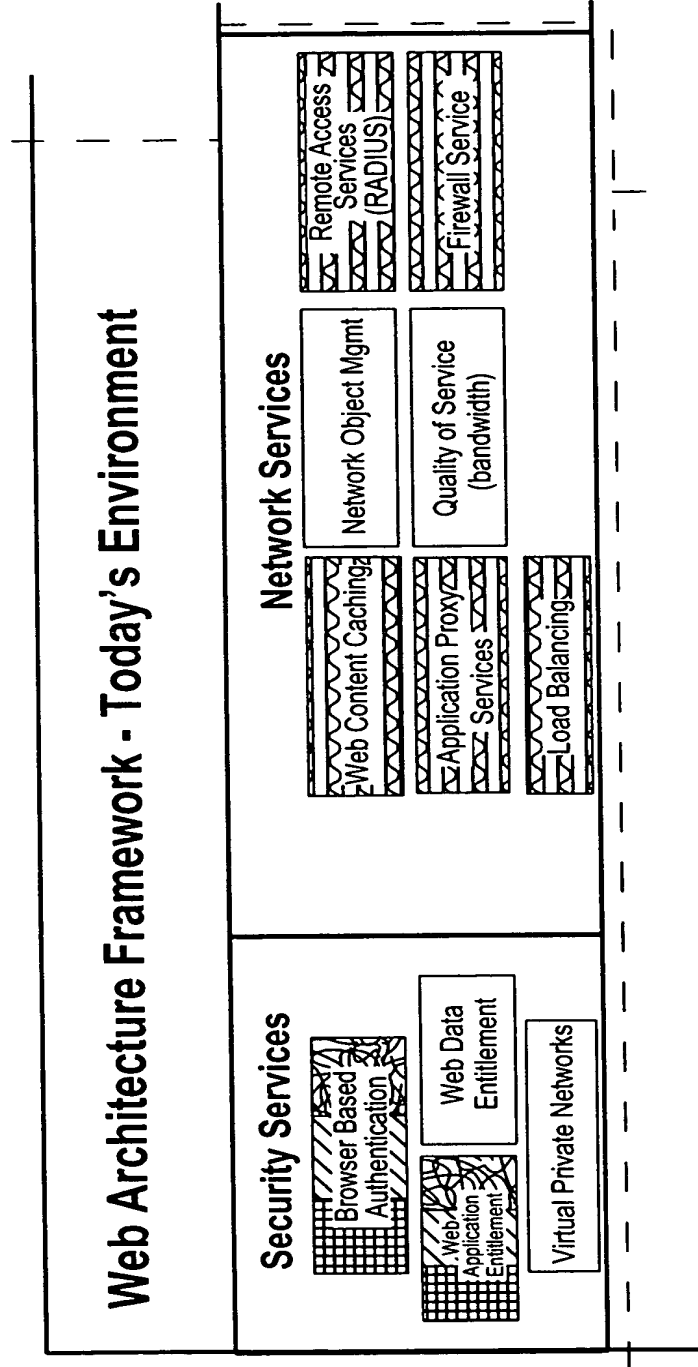


Fig. 23A

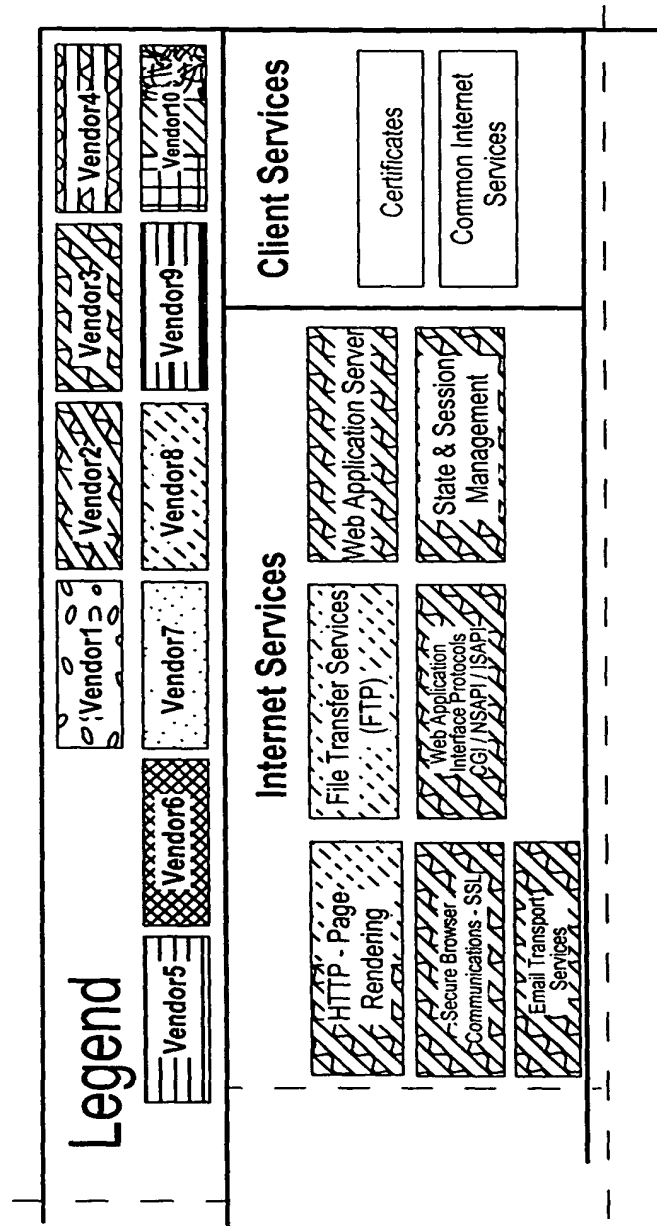


Fig. 23B

Web Application Services

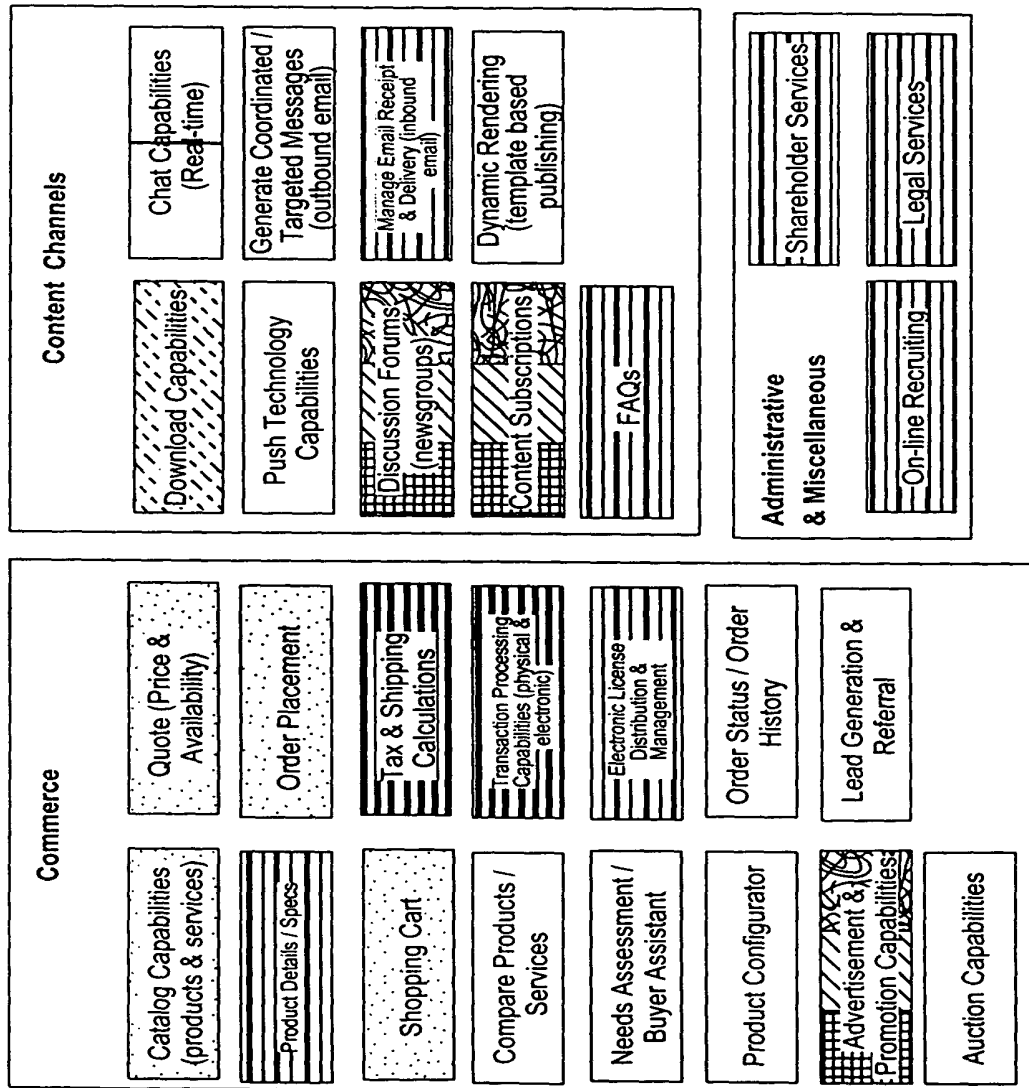


Fig. 23C

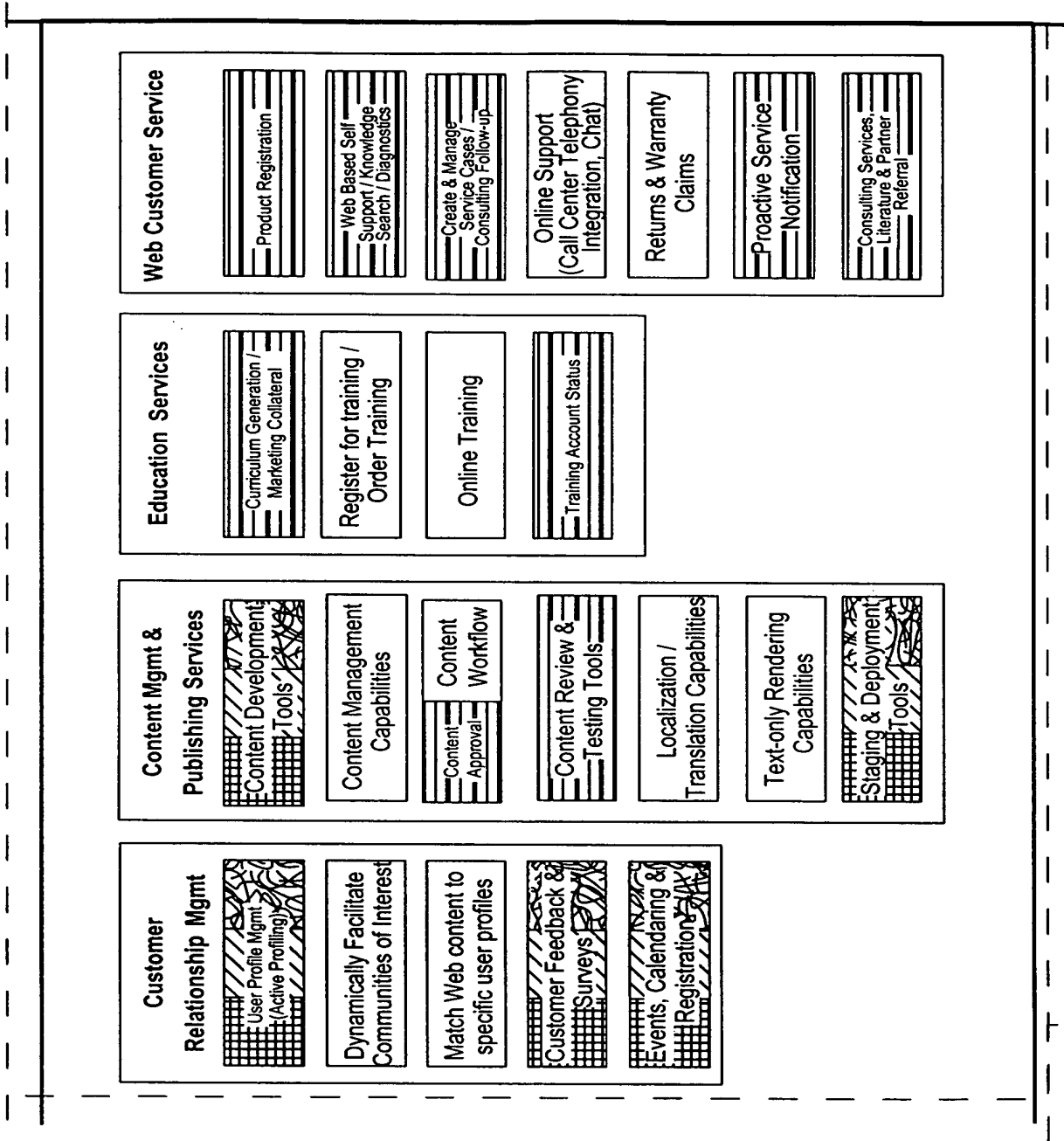


Fig. 23D

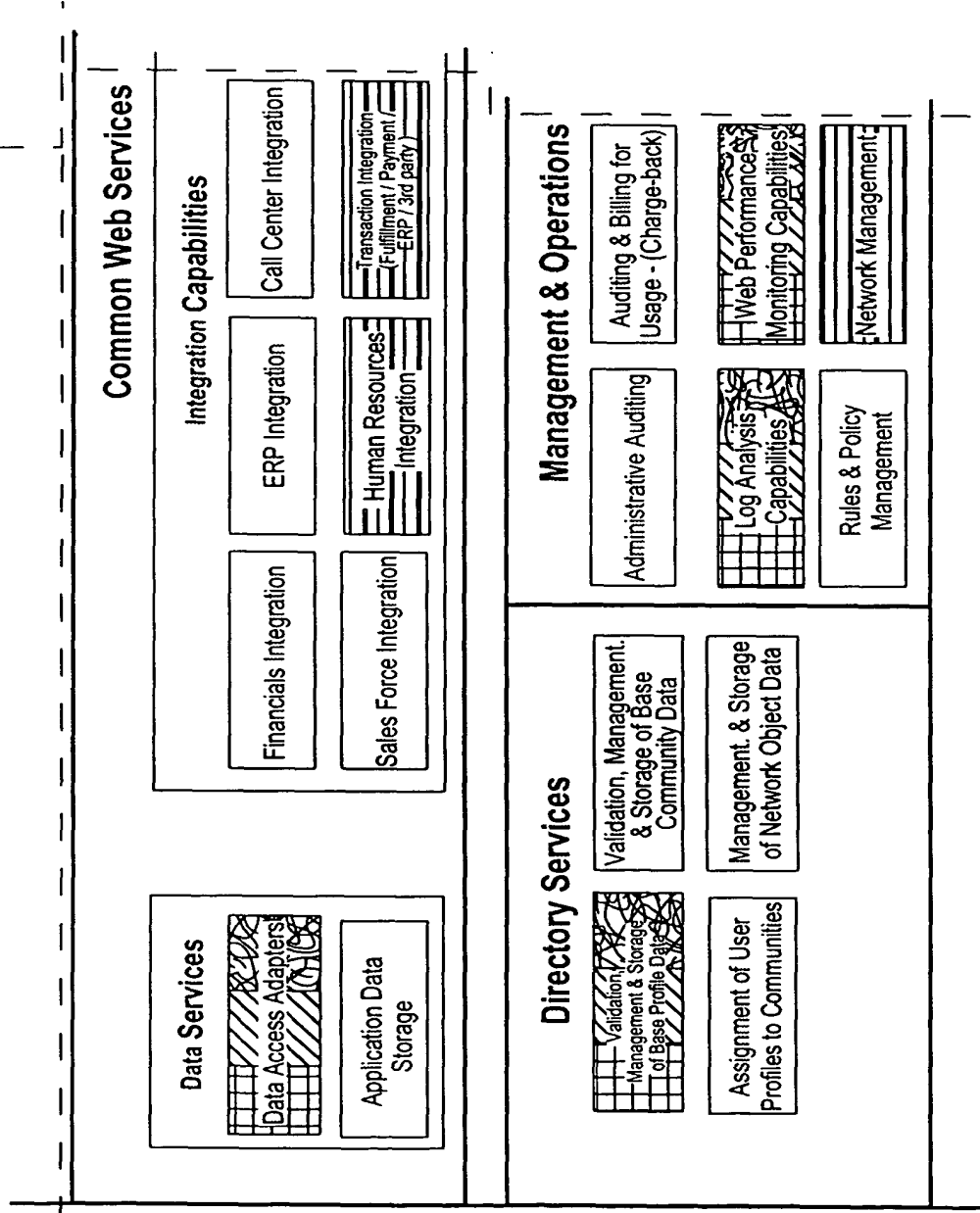


Fig. 23E

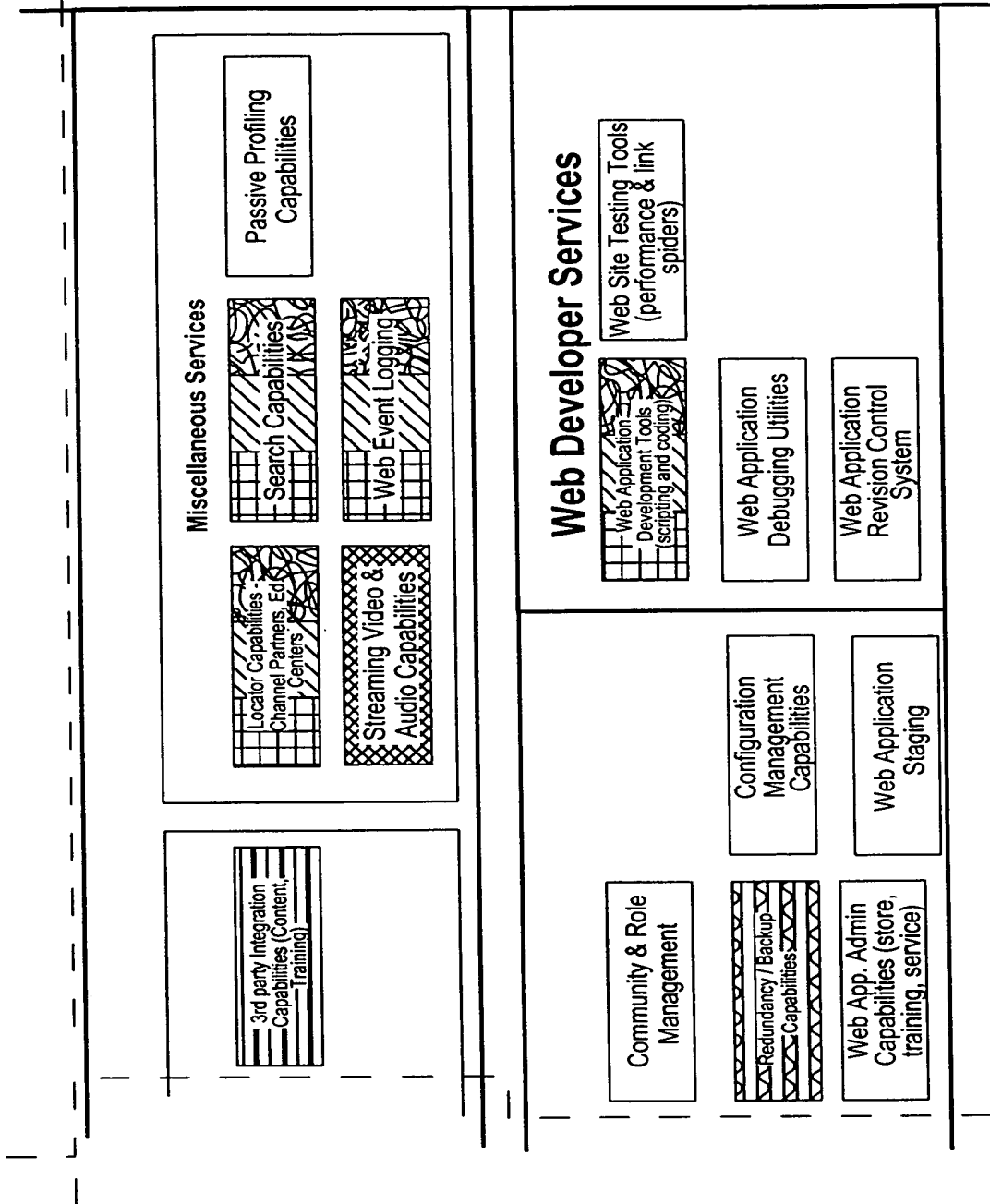


Fig. 23F

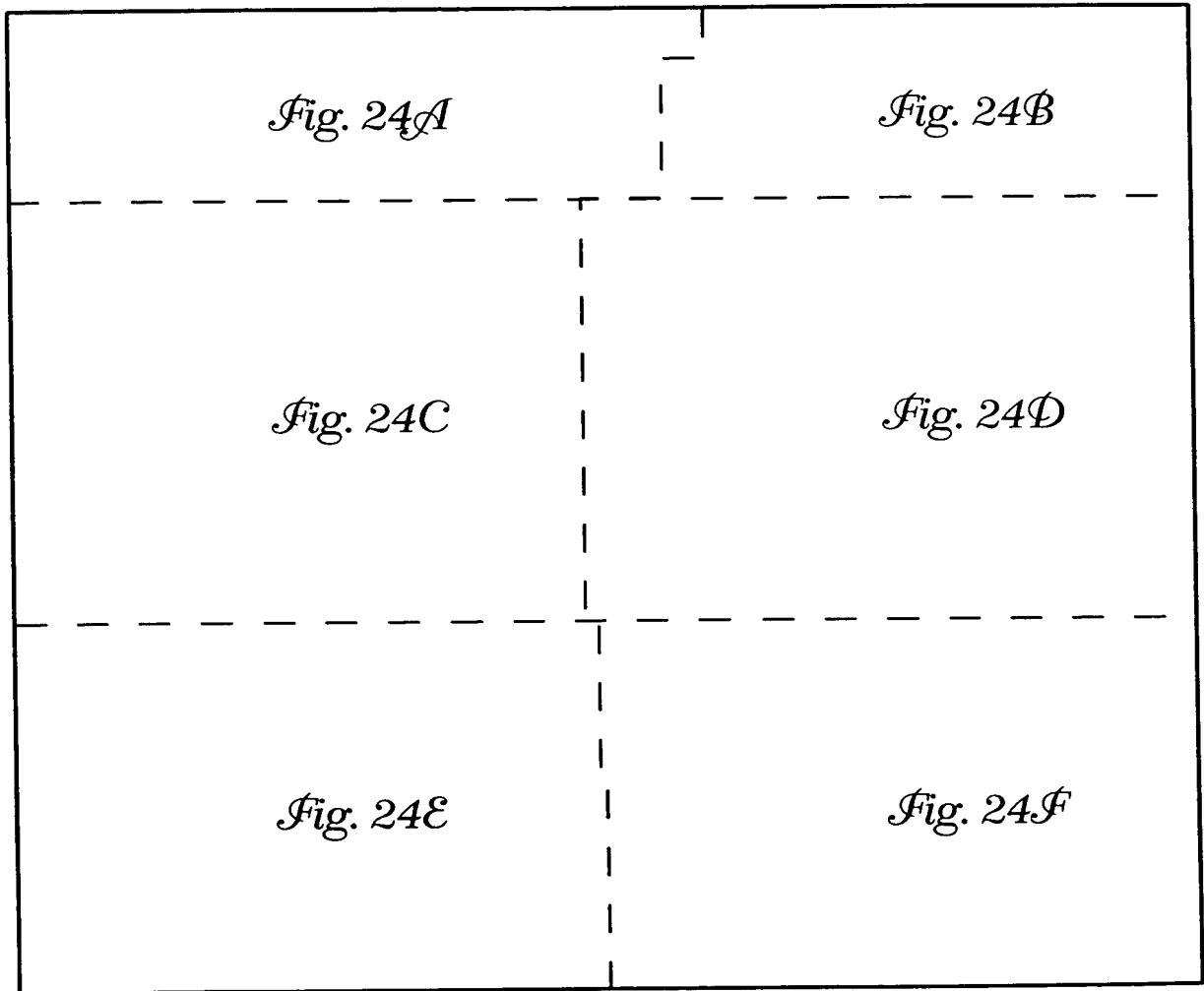


Fig. 24

Web Architecture Framework - Core Commerce Capabilities

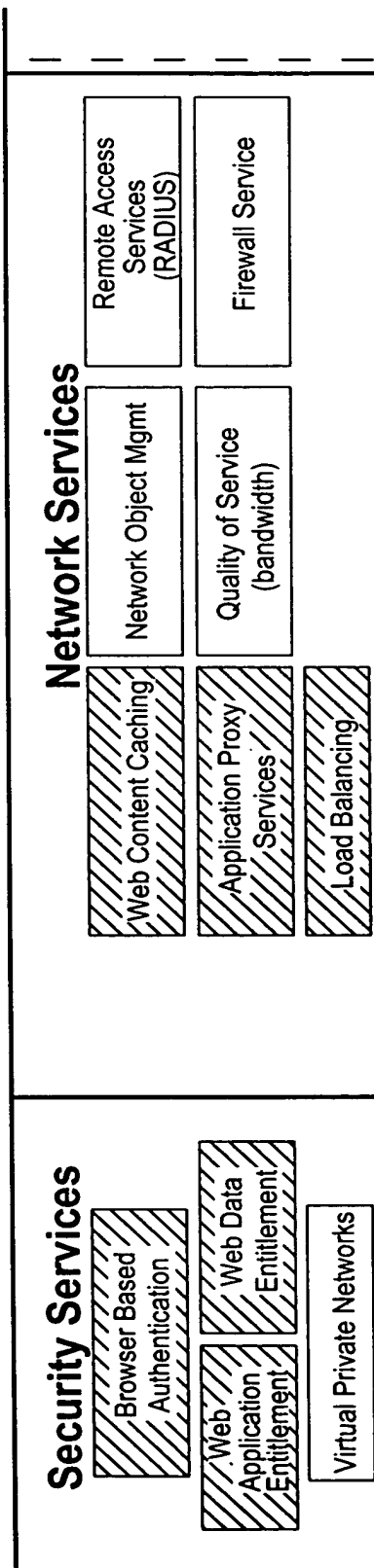


Fig. 24A

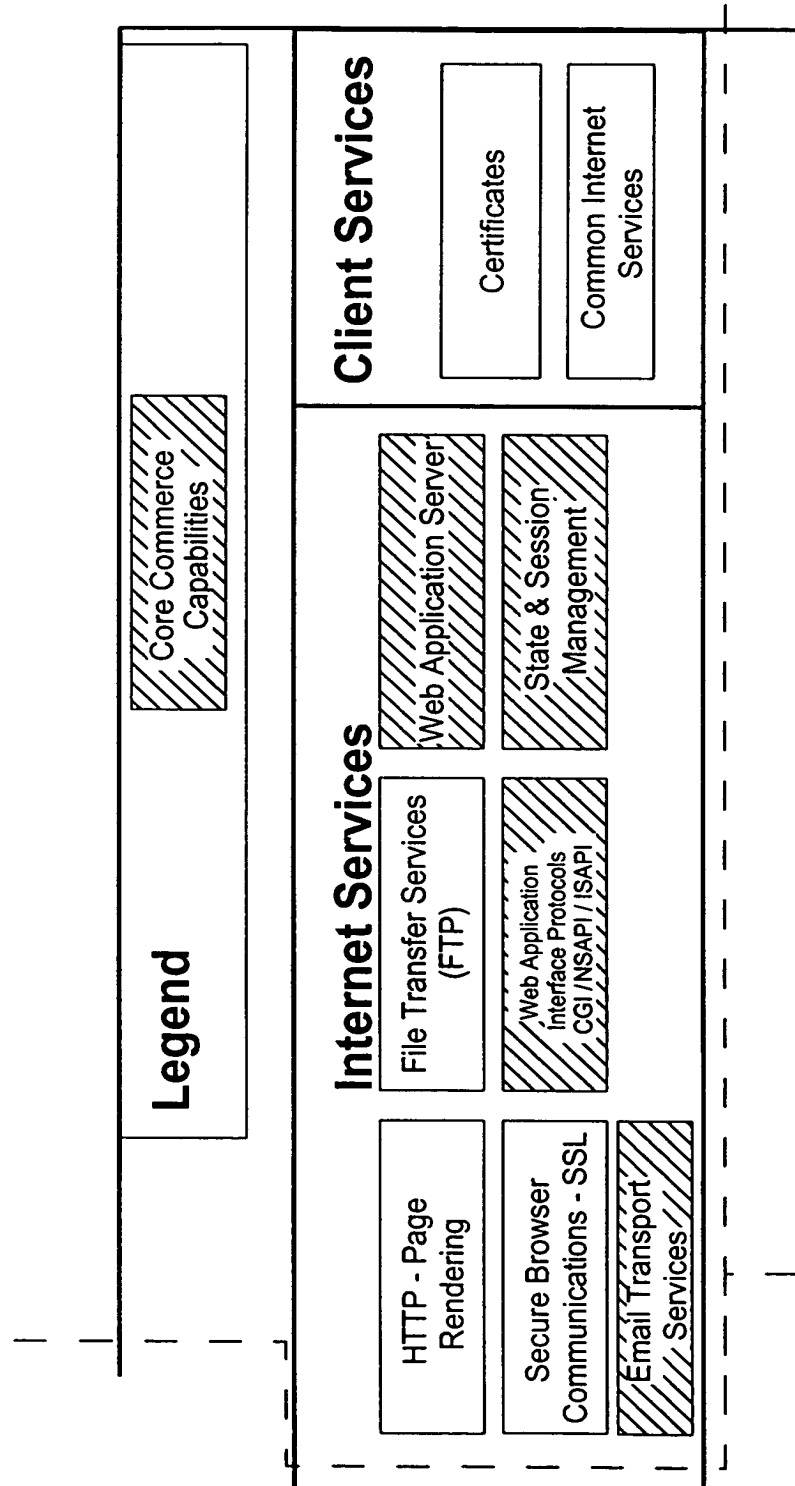


Fig. 24B

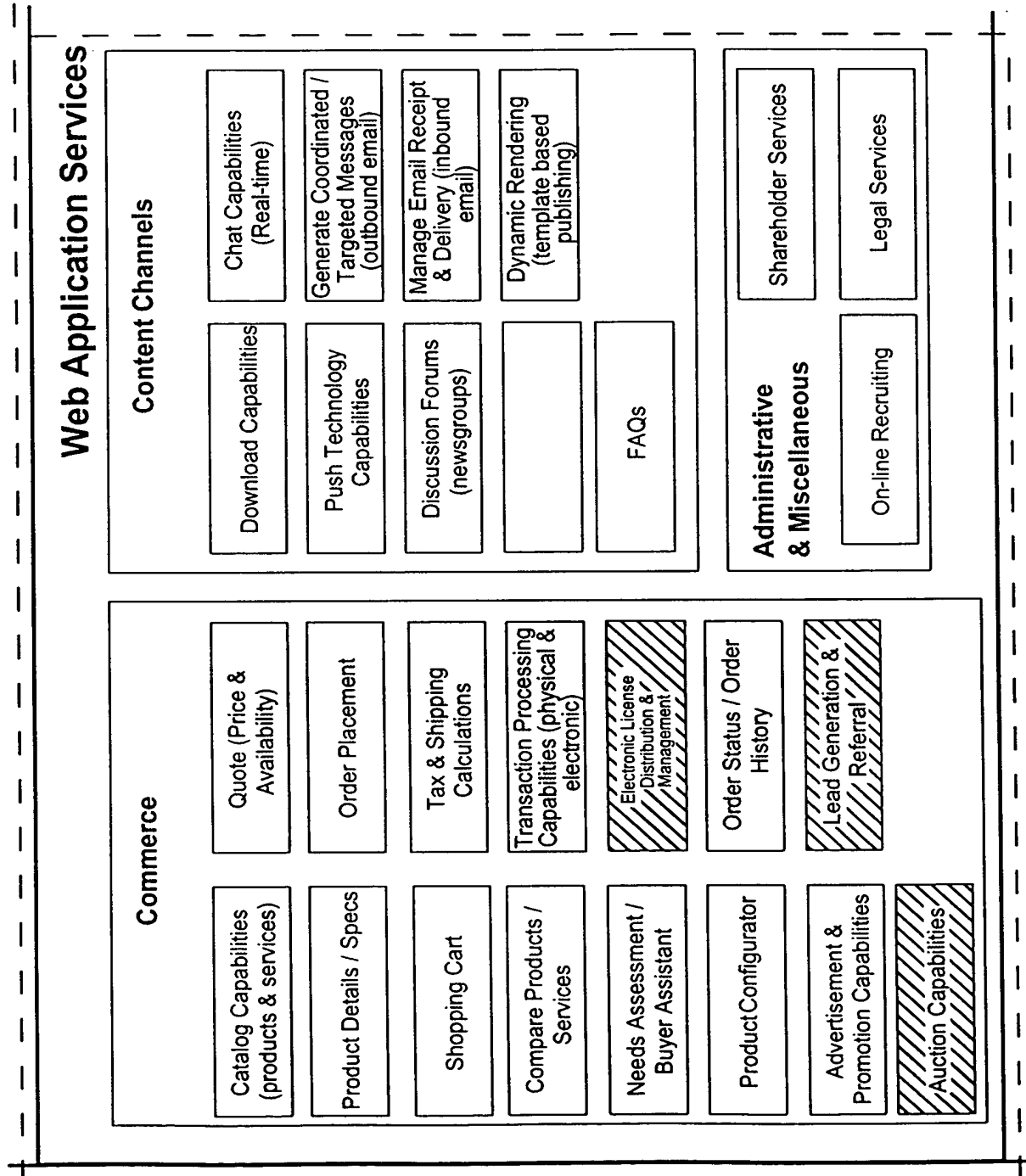


Fig. 24C

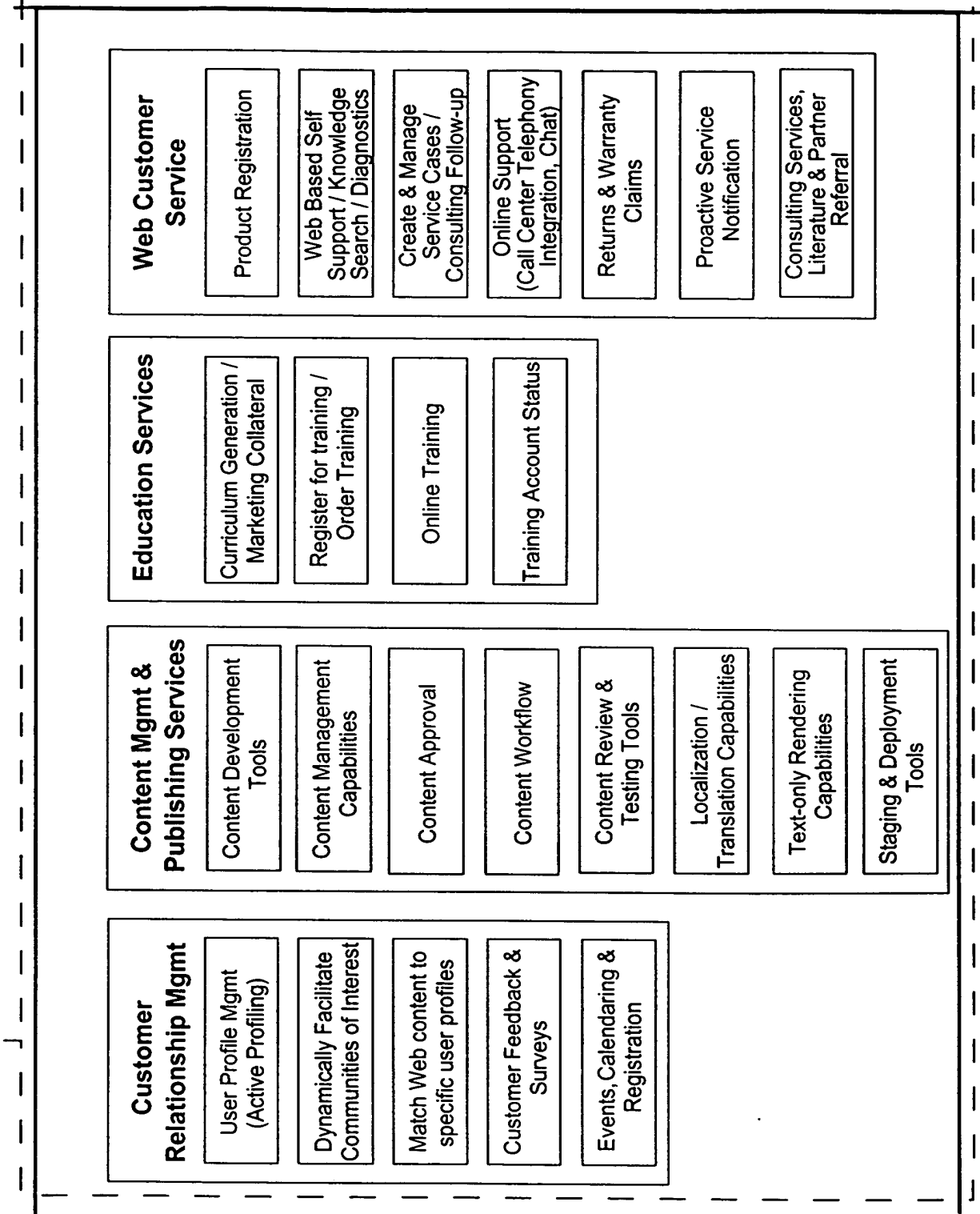


Fig. 24D

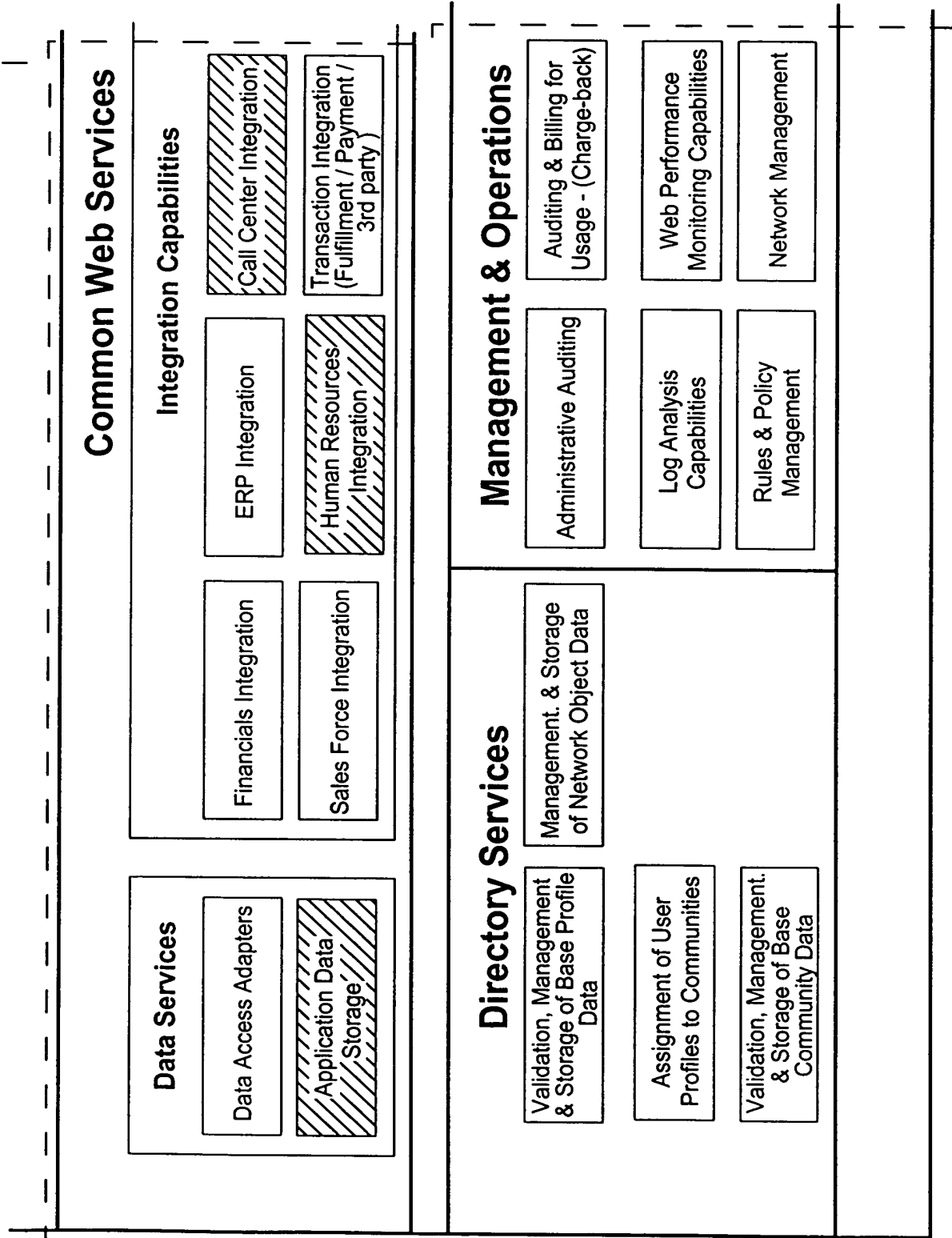


Fig. 24E

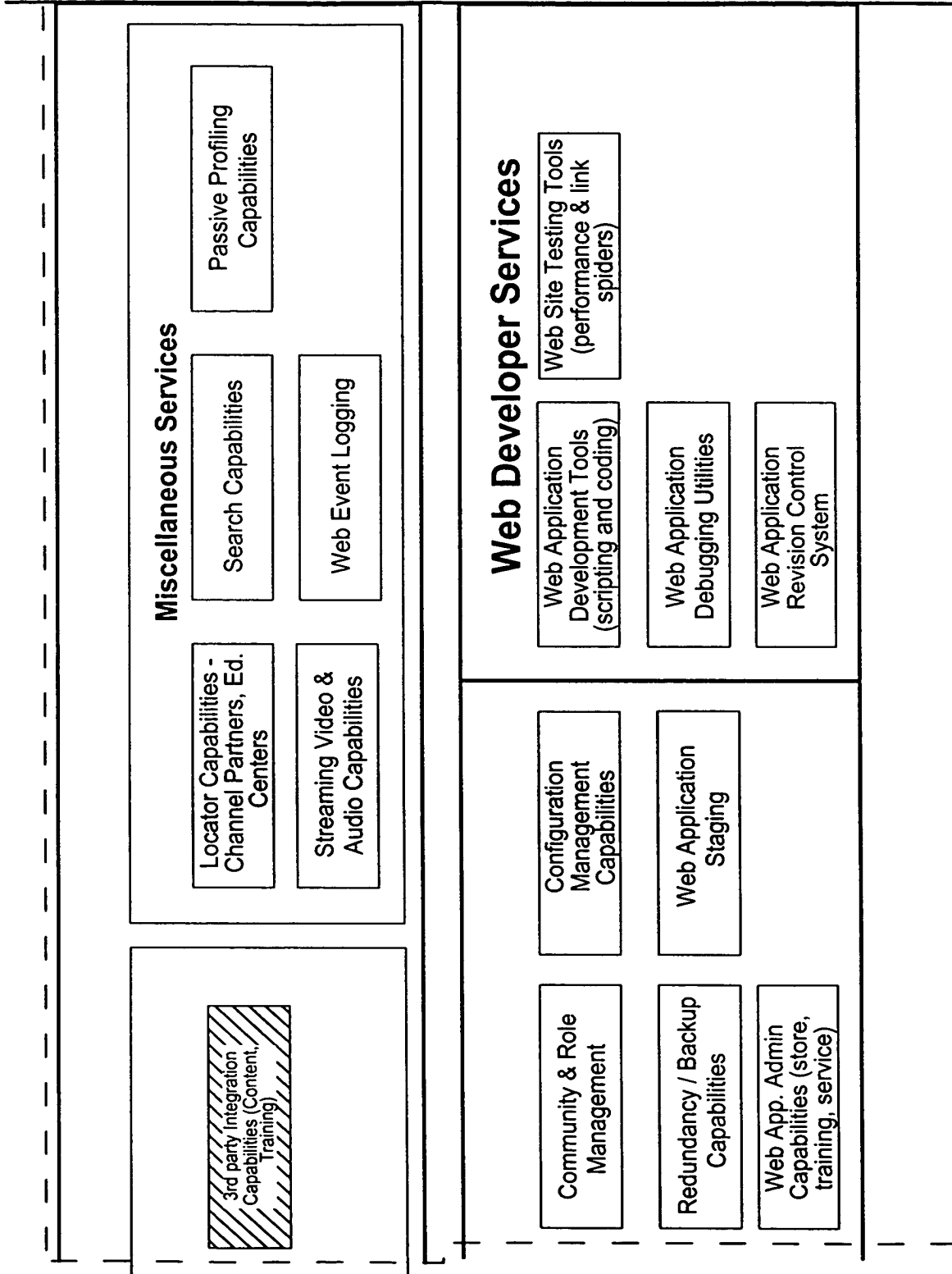


Fig. 24F

REPLACEMENT SHEET

Inventor: GUHEEN ET AL.

Docket No.: 8567.111USC1

Title: BUSINESS ALLIANCE IDENTIFICATION IN A WEB ARCHITECTURE
FRAMEWORK (AS AMENDED HEREIN)

Attorney Name: JEFFREY P. COOK

Phone No.: 612.332.5300

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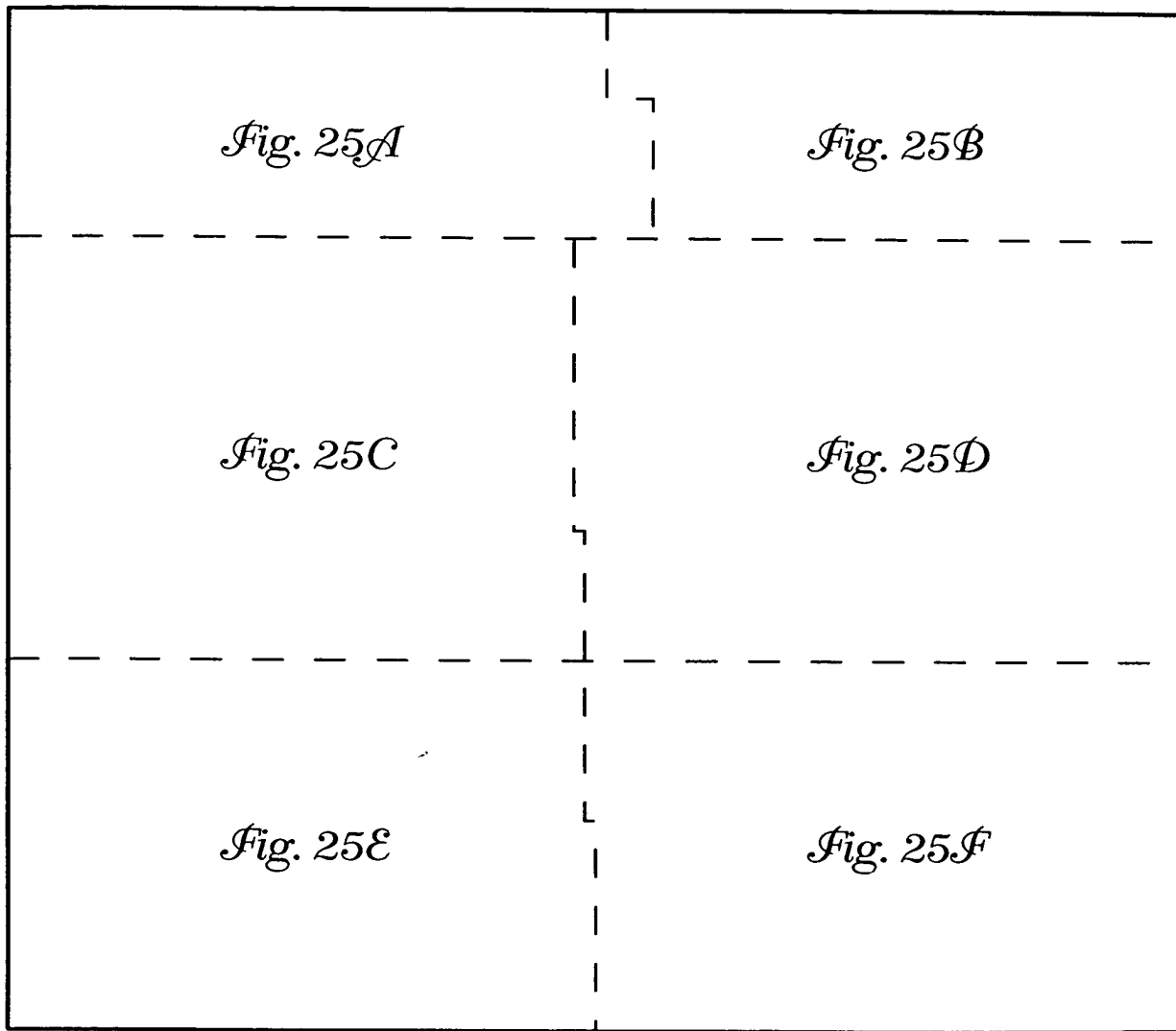


Fig. 25

Web Architecture Framework - Immediate Activities

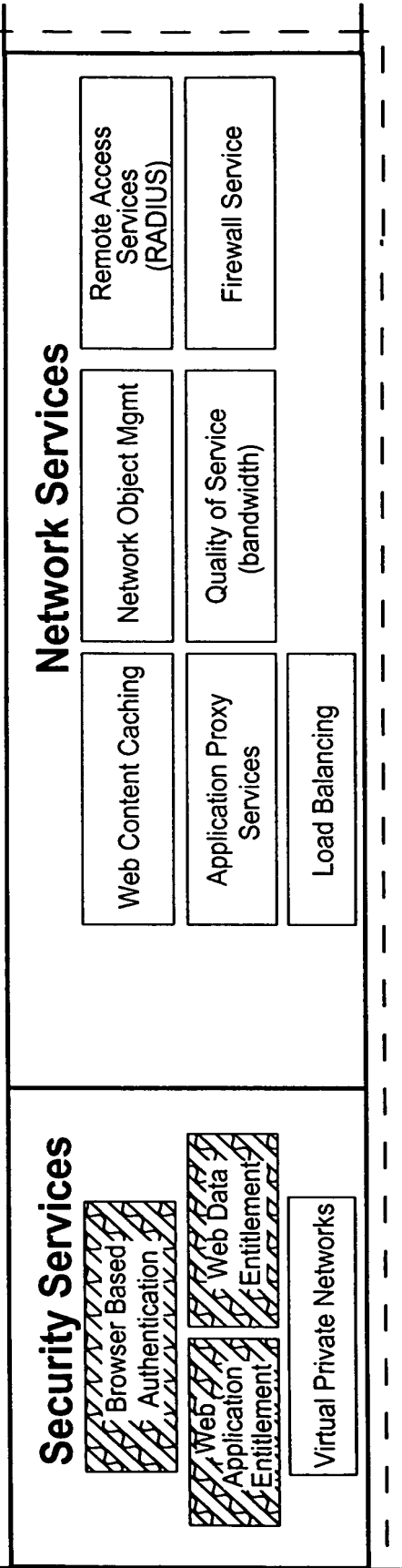


Fig. 25A

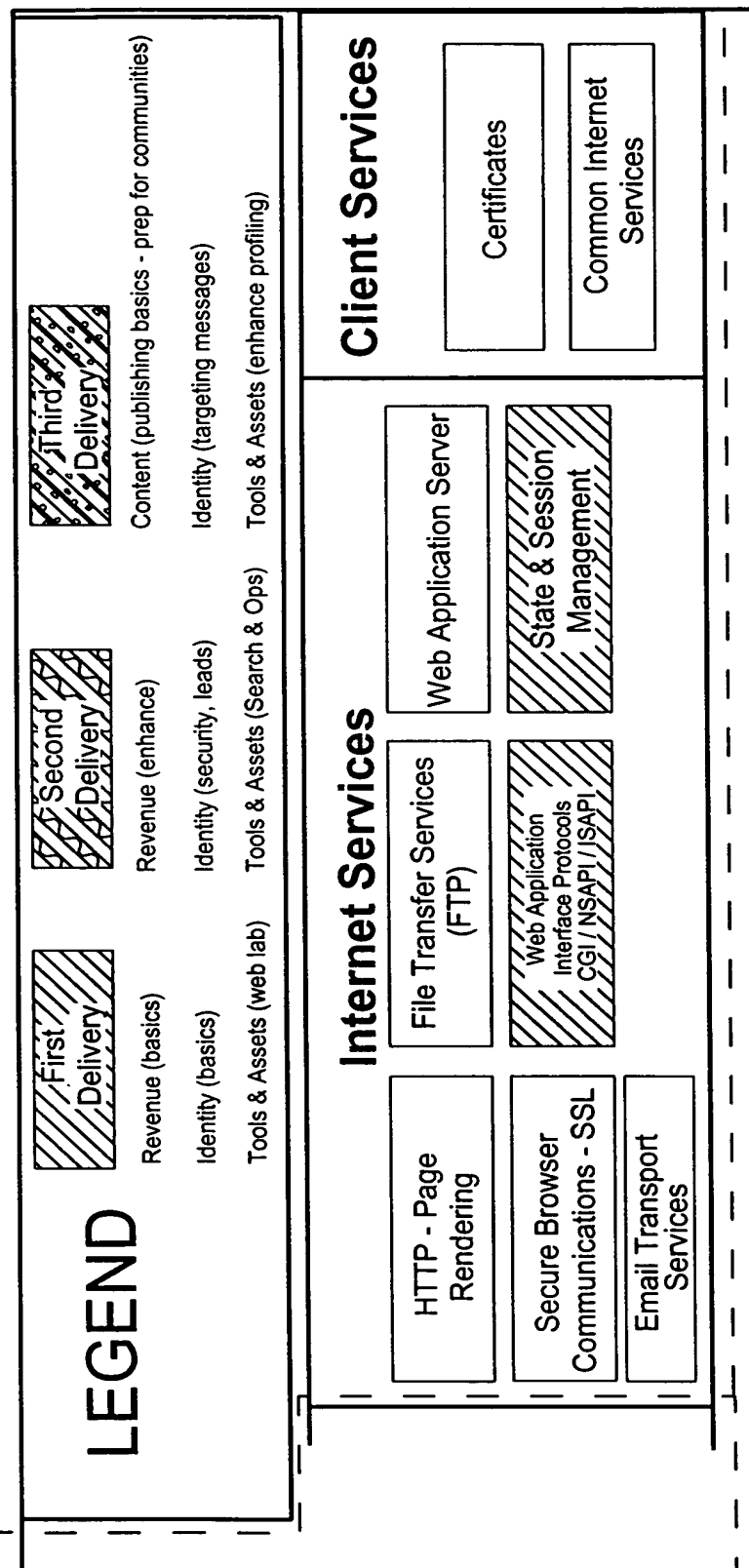


Fig. 25B

Web Application Services

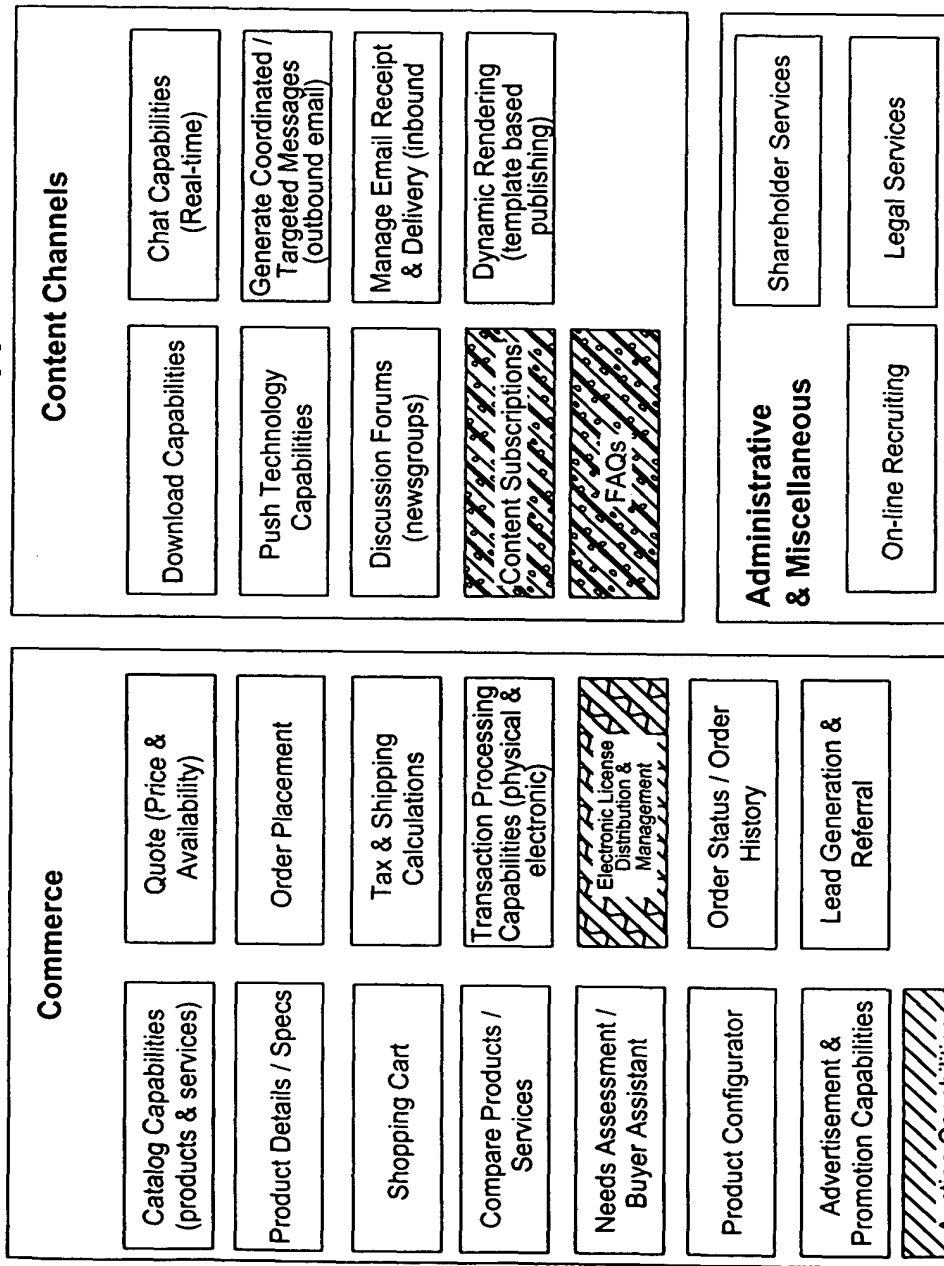


Fig. 25C

REPLACEMENT SHEET

Inventor: GUHEEN ET AL. Docket No.: 8567.111USC1
Title: BUSINESS ALLIANCE IDENTIFICATION IN A WEB ARCHITECTURE
FRAMEWORK (AS AMENDED HEREIN)
Attorney Name: JEFFREY P. COOK
Phone No.: 612.332.5300
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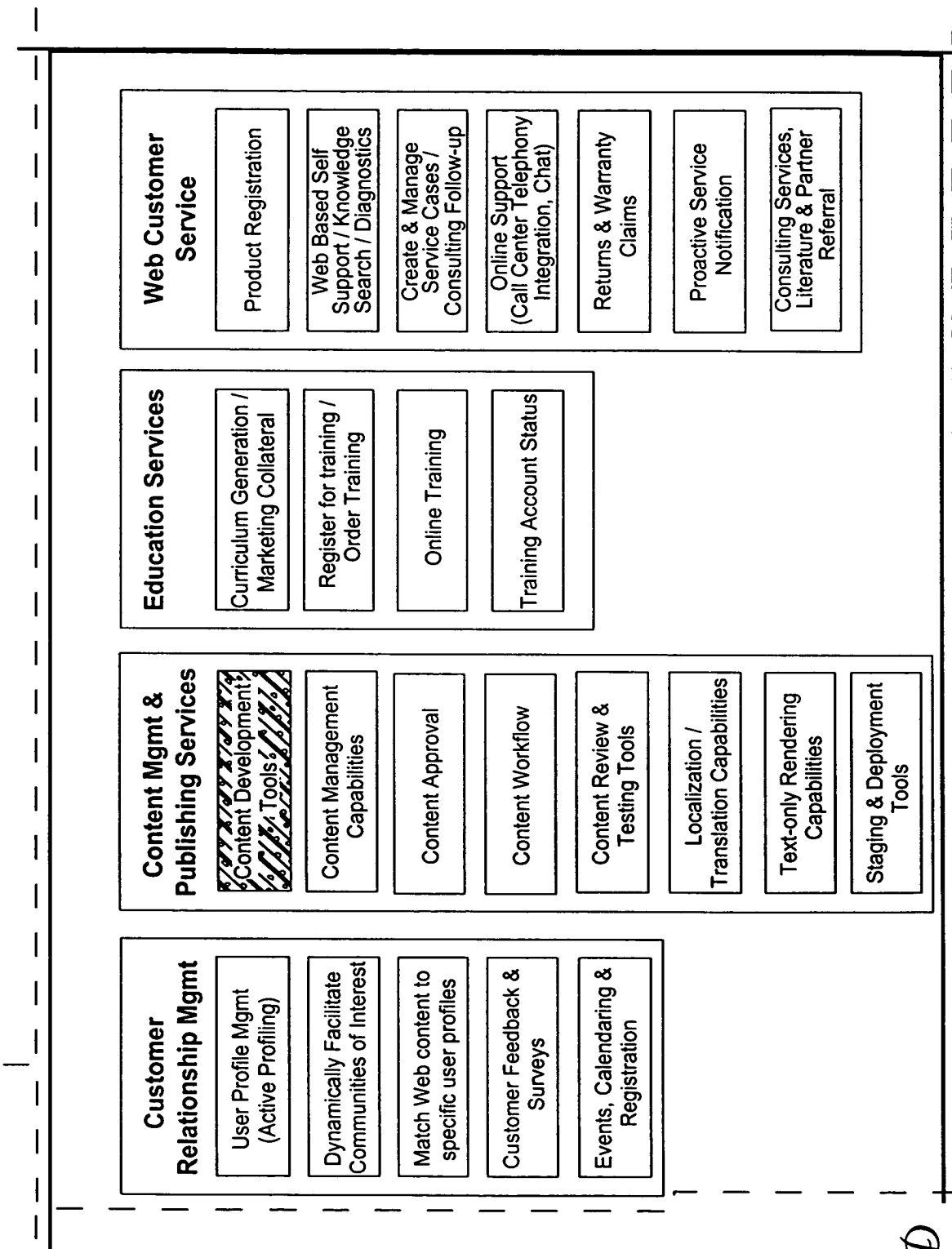


Fig. 25D

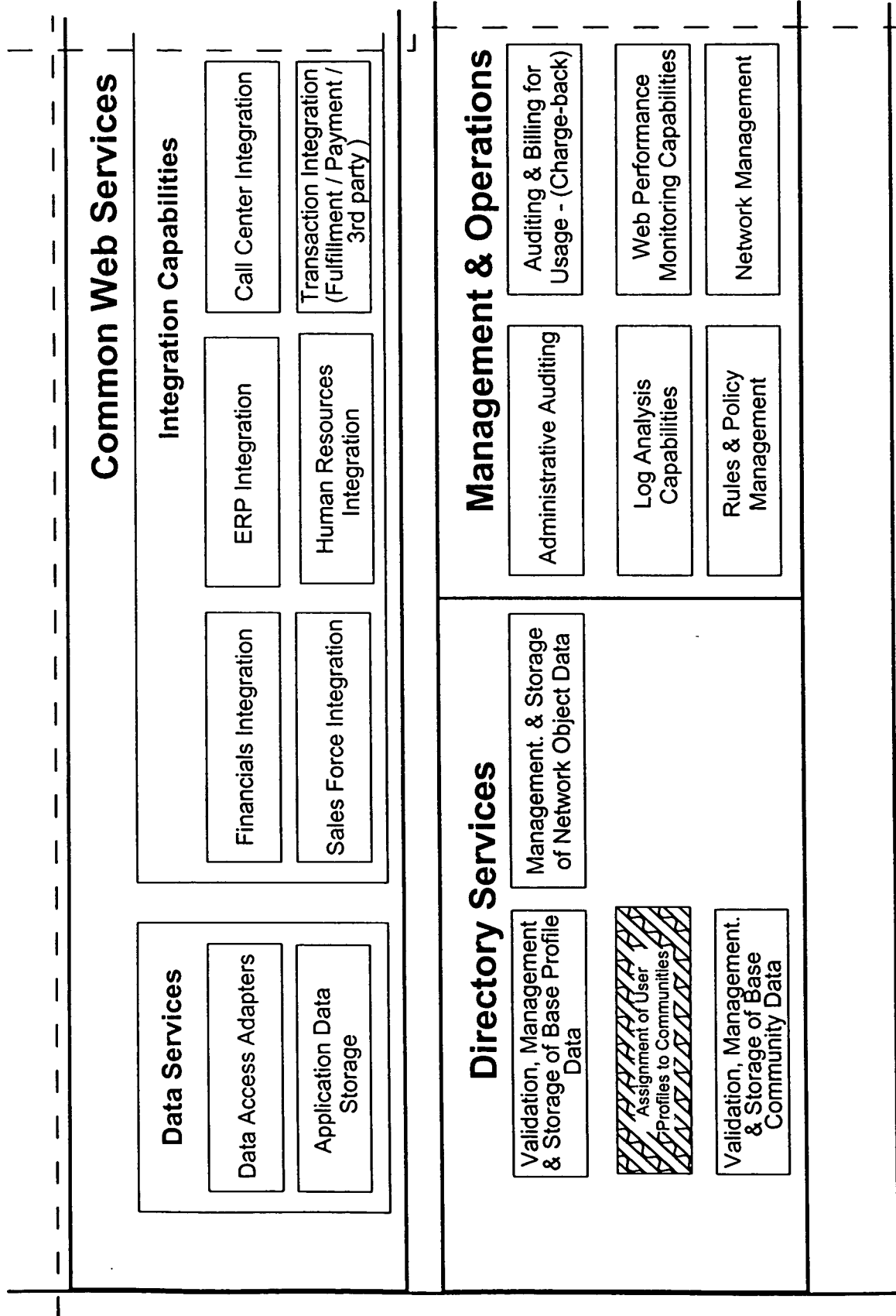


Fig. 25E

REPLACEMENT SHEET

Inventor: GUHEEN ET AL.

Docket No.: 8567.111USC1

Title: BUSINESS ALLIANCE IDENTIFICATION IN A WEB ARCHITECTURE FRAMEWORK (AS AMENDED HEREIN)

Attorney Name: JEFFREY P. COOK

Phone No.: 612.332.5300

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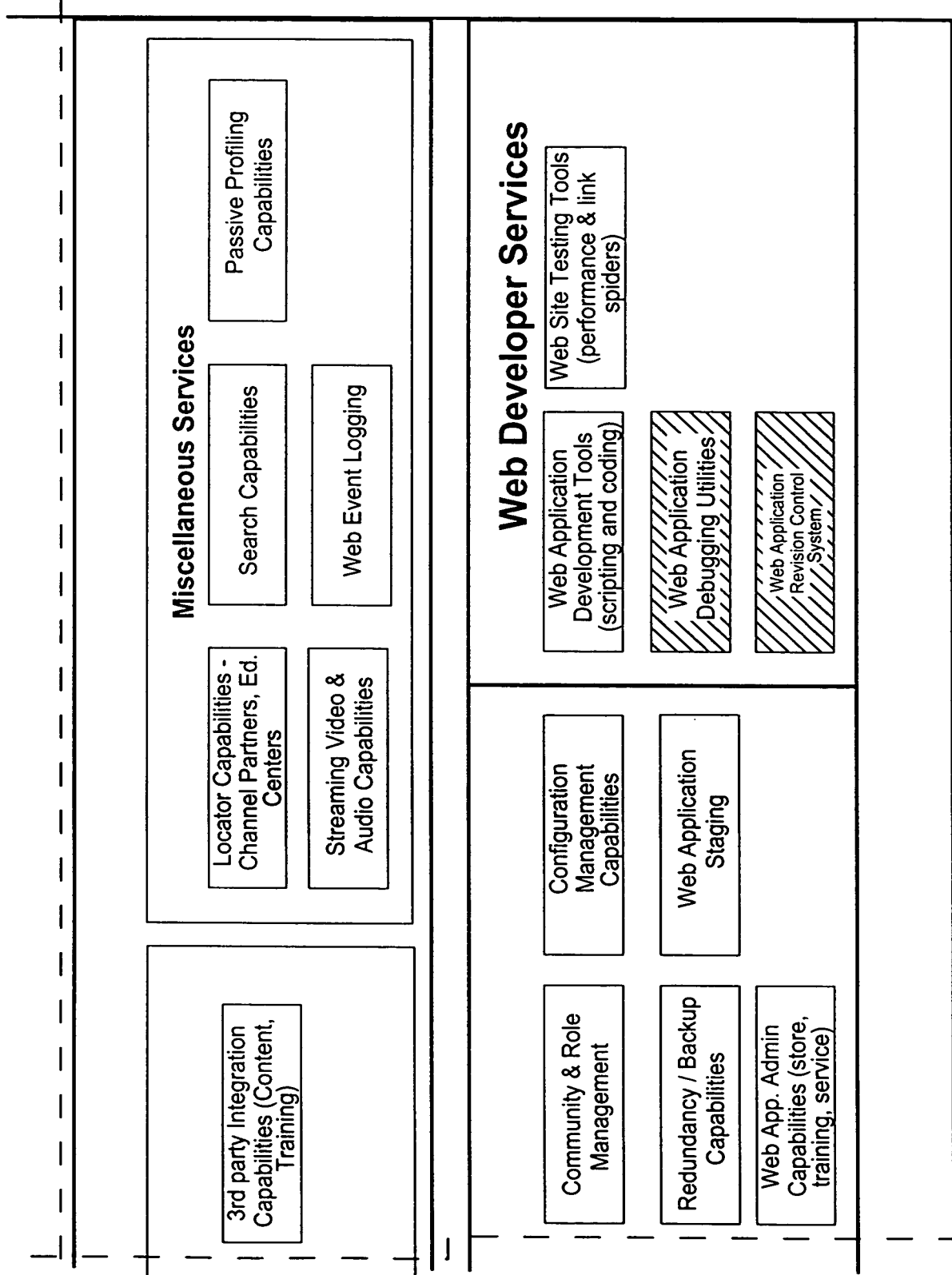


Fig. 25f

REPLACEMENT SHEET

Inventor: GUHEEN ET AL.

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Title: BUSINESS ALLIANCE IDENTIFICATION IN A WEB ARCHITECTURE
FRAMEWORK (AS AMENDED HEREIN)

Attorney Name: JEFFREY P. COOK

Phone No.: 612.332.5300

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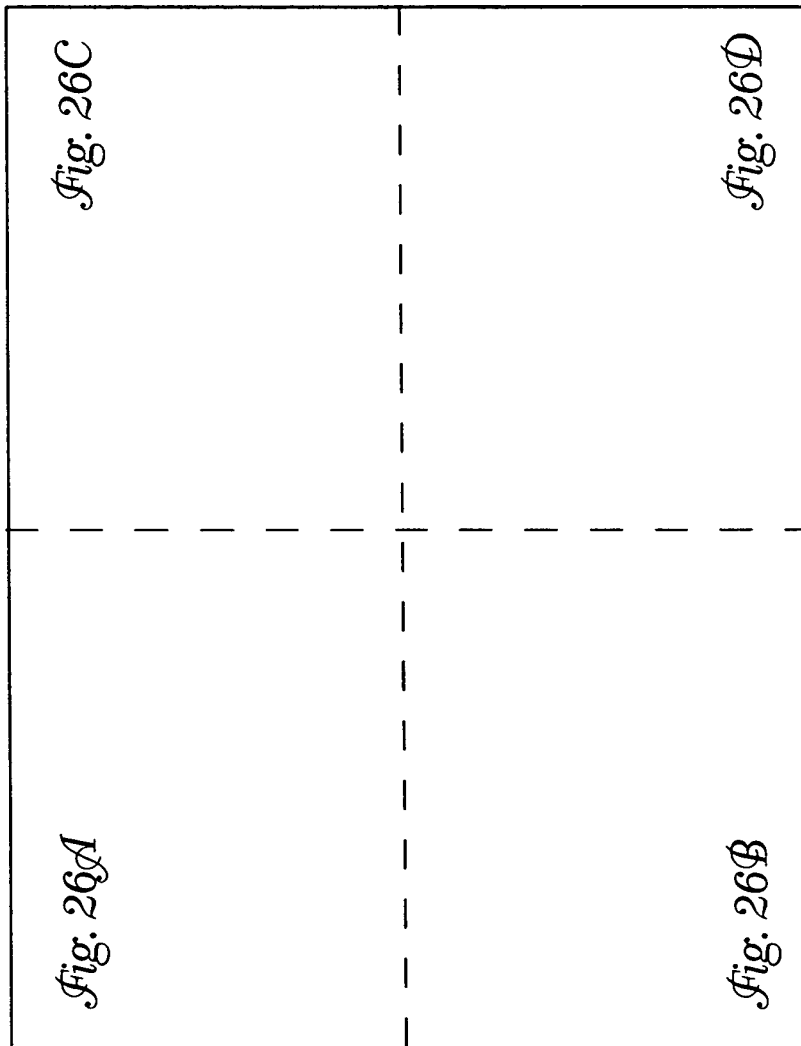





Fig. 26

Fig. 26A

Core Commerce Capabilities - Infrastructure Services

Core Capabilities	Existing Capabilities
	<input type="checkbox"/> Verifies user identity using built-in browser functionality <input type="checkbox"/> Maintains authentication information throughout sessions <input type="checkbox"/> Utilizes centralized directory of profiles <input type="checkbox"/> Provides LDAP compatibility <input type="checkbox"/> Provides NDS Compatibility
	<input type="checkbox"/> Restricts access to specific web applications based upon user privileges <input type="checkbox"/> Determines if a user or group of users have permission to perform an operation in a specific application <input type="checkbox"/> Utilizes centralized directory of profiles for entitlement data <input type="checkbox"/> Provides LDAP compatibility <input type="checkbox"/> Provides NDS compatibility
	<input type="checkbox"/> Restricts access to web content and data based upon user privileges <input type="checkbox"/> Determines if a user or group of users have permission to manipulate web data (create, read, update, delete) <input type="checkbox"/> Utilizes centralized directory of profiles for entitlement data <input type="checkbox"/> Provides LDAP compatibility <input type="checkbox"/> Provides NDS compatibility

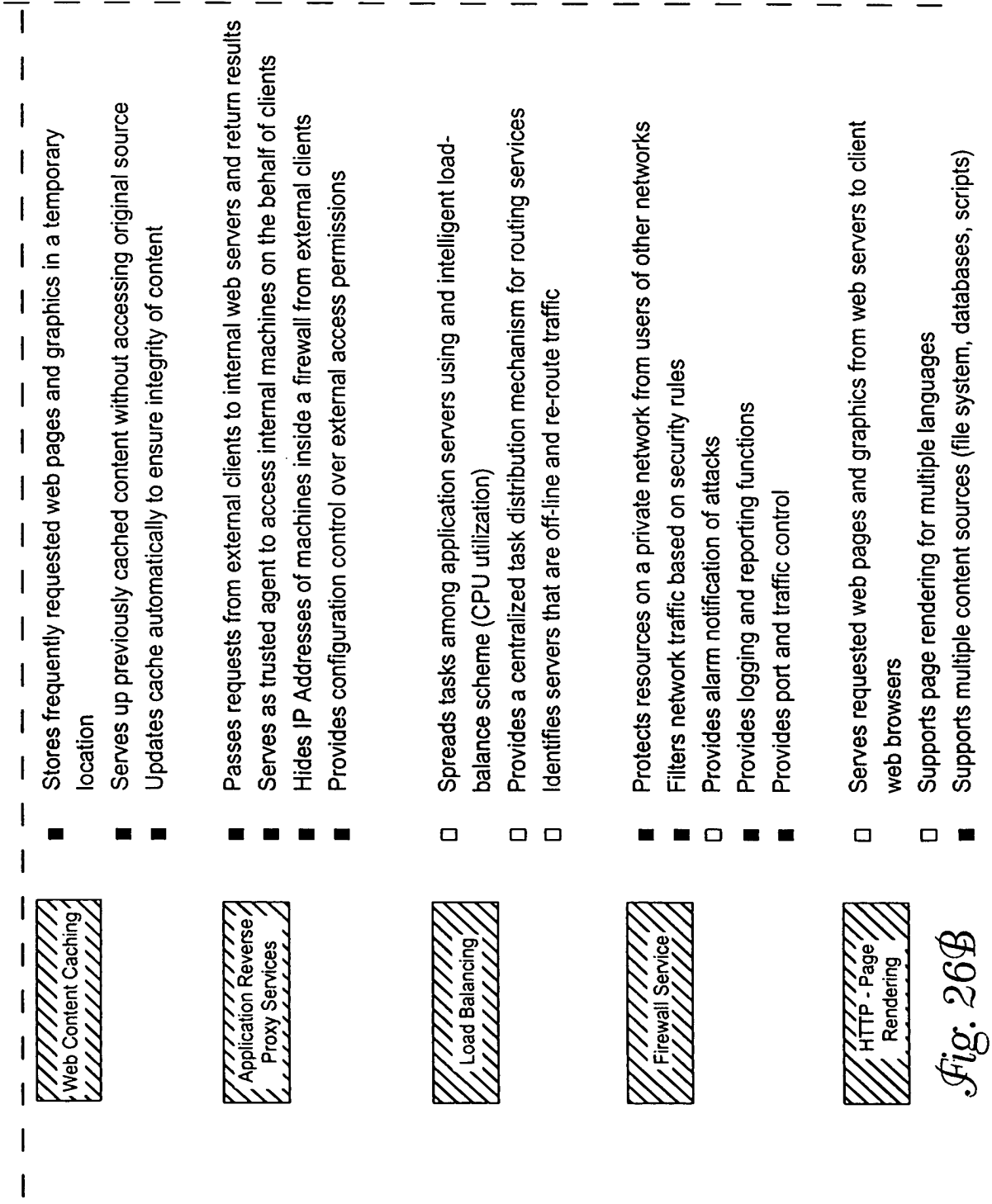


Fig. 26B

Fig. 26C

<div> <div>Legend:</div> <div> <div>■ Available Today</div> </div> </div>	
Core Capabilities	Existing Capabilities
<div>Secure Browser Communications - SSL</div>	<ul style="list-style-type: none"> Provides encrypted communication with common web browsers Supports the Secure Sockets Layer protocol 2.0 Supports the Secure Sockets Layer protocol 3.0
<div>File Transfer Services (FTP)</div>	<ul style="list-style-type: none"> Transfers files between computers on the Internet using the standard File Transfer Protocol (FTP) Stores files on a file system or database Provides mechanism to manage access control for files on a FTP server
<div>Web Application Interface Protocols CGI/NSAPI/ISAPI</div>	<ul style="list-style-type: none"> Supports Common Gateway Interface (CGI) protocol Supports Netscape API (NSAPI) protocol Supports Microsoft s API (ISAPI) protocol Provides alternative to the interface mechanism that may be used
<div>Web Application Server Plug-in</div>	<ul style="list-style-type: none"> Executes web application logic Utilizes user session information to support interactive applications Provides scalability features Provides fail-over features Provides application programming logic

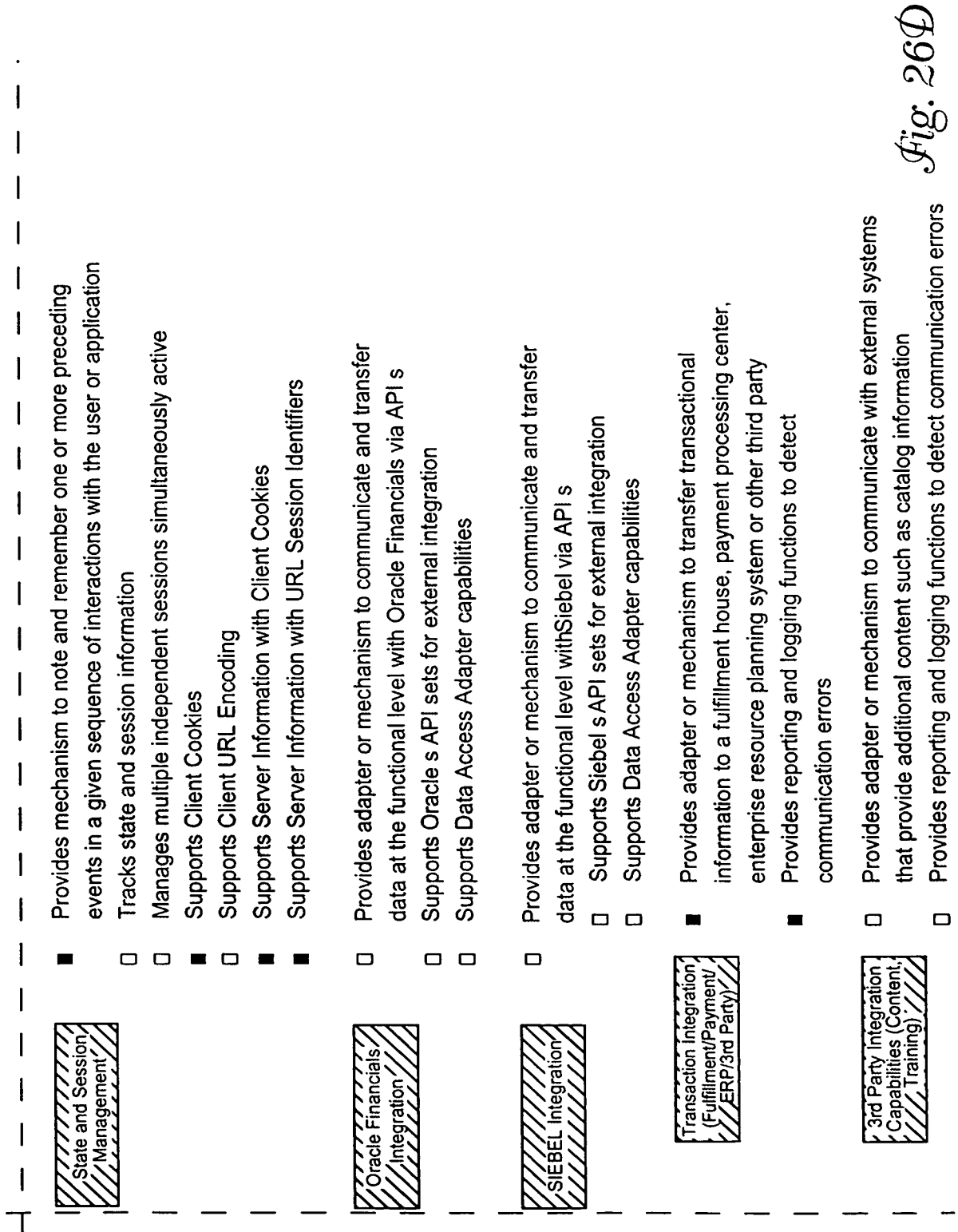


Fig. 26D

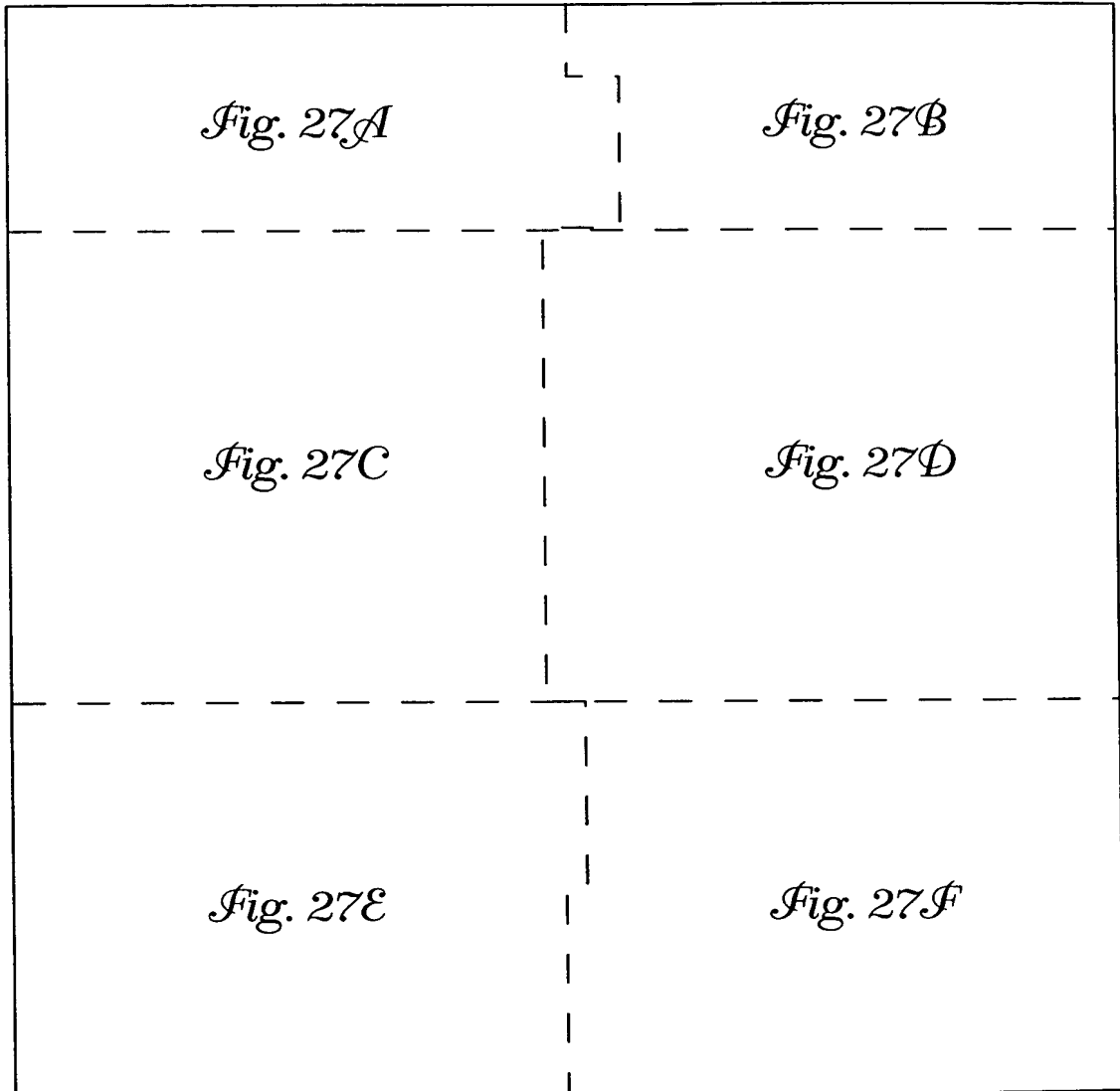


Fig. 27

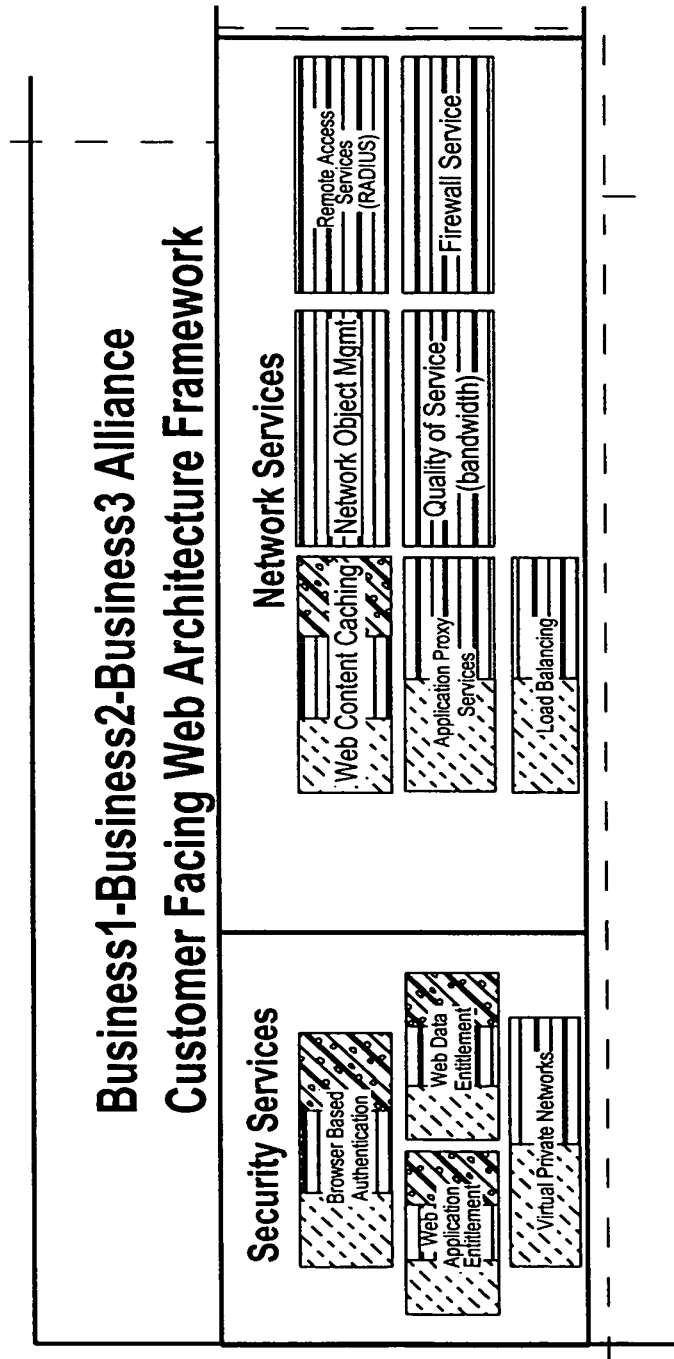


Fig. 27A

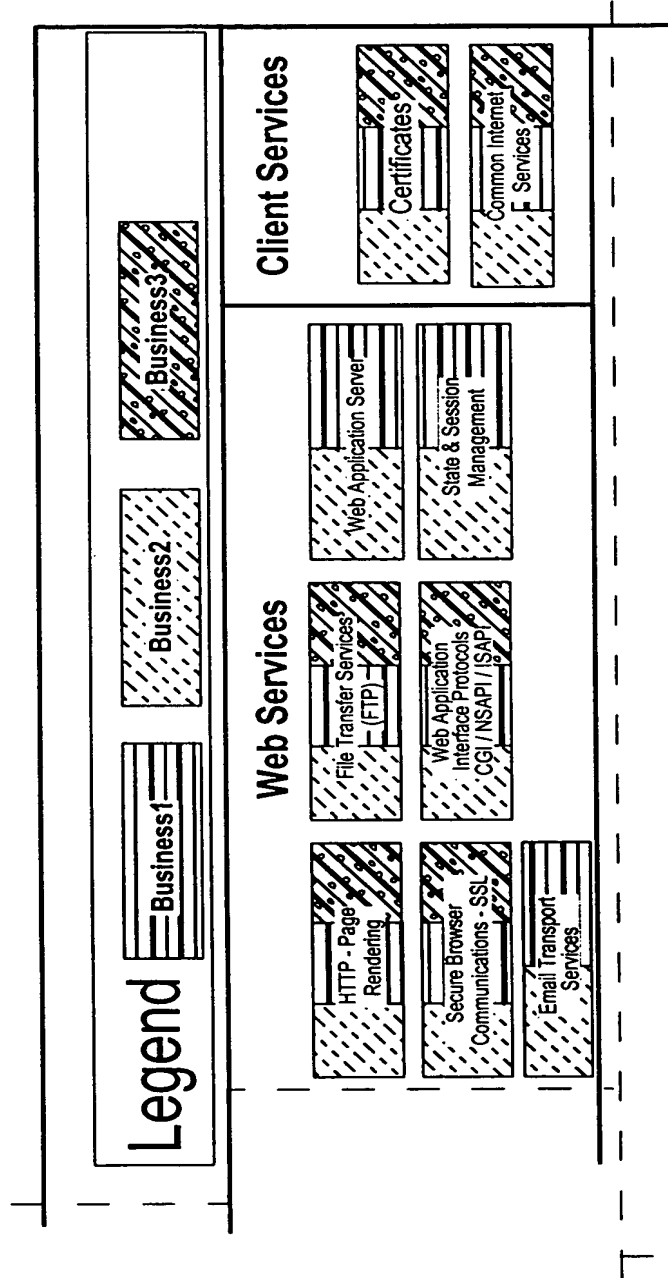


Fig. 27B

Web Application Services

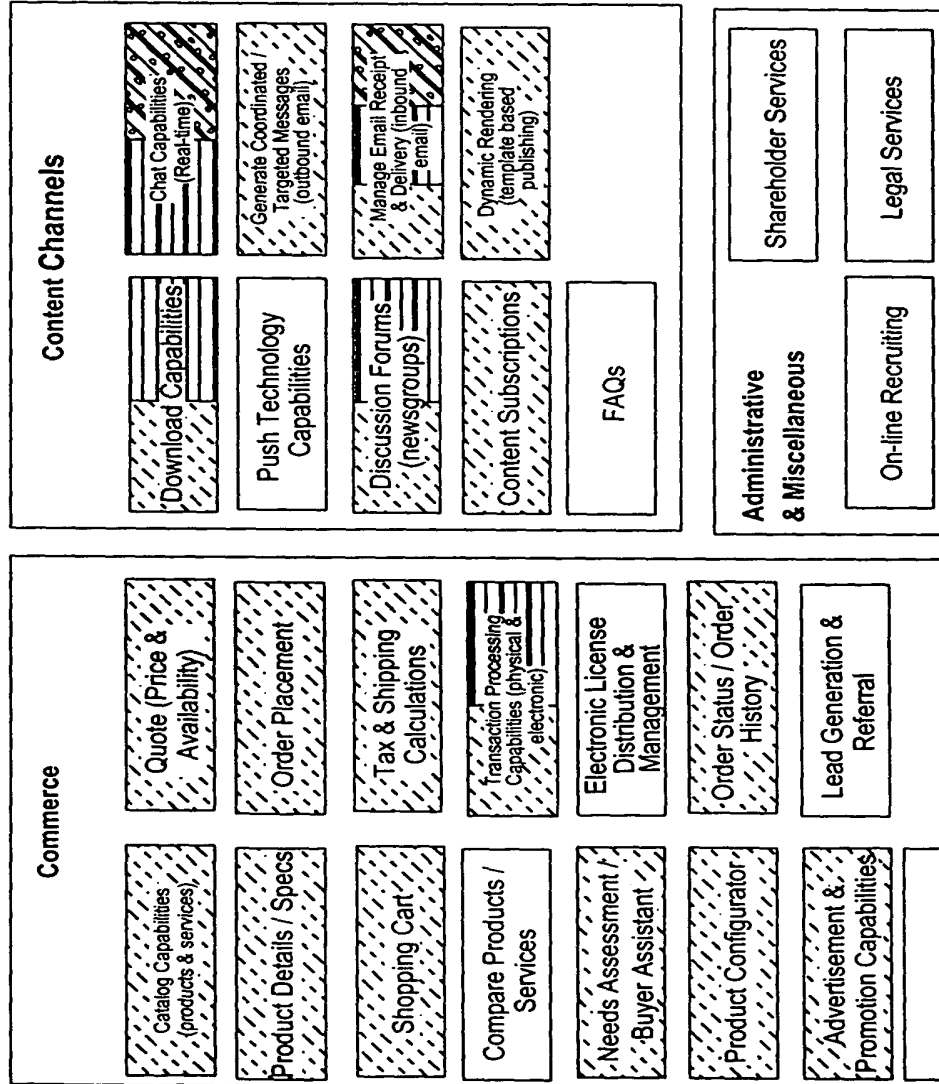


Fig. 27C

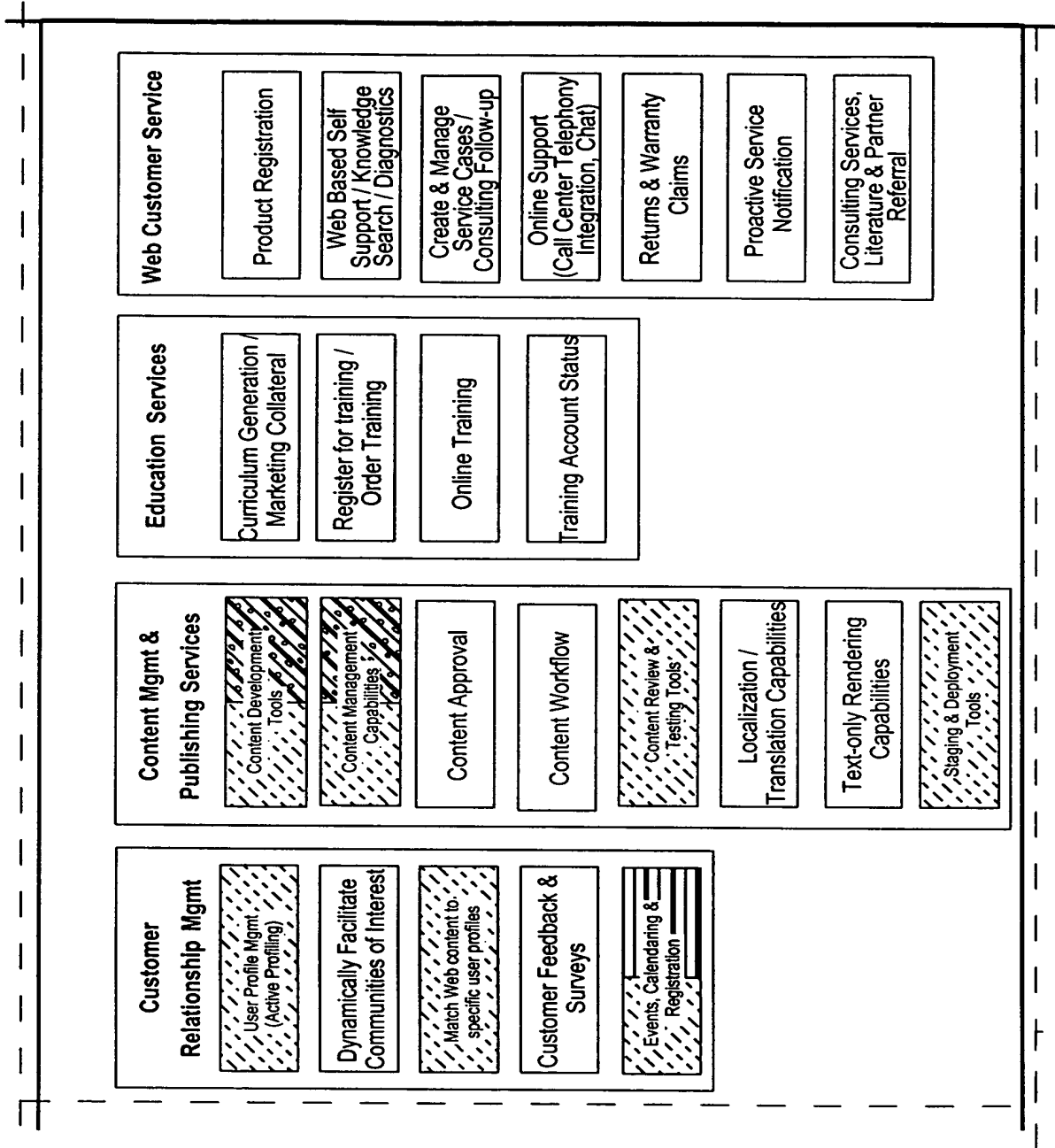


Fig. 27D

Fig. 27E

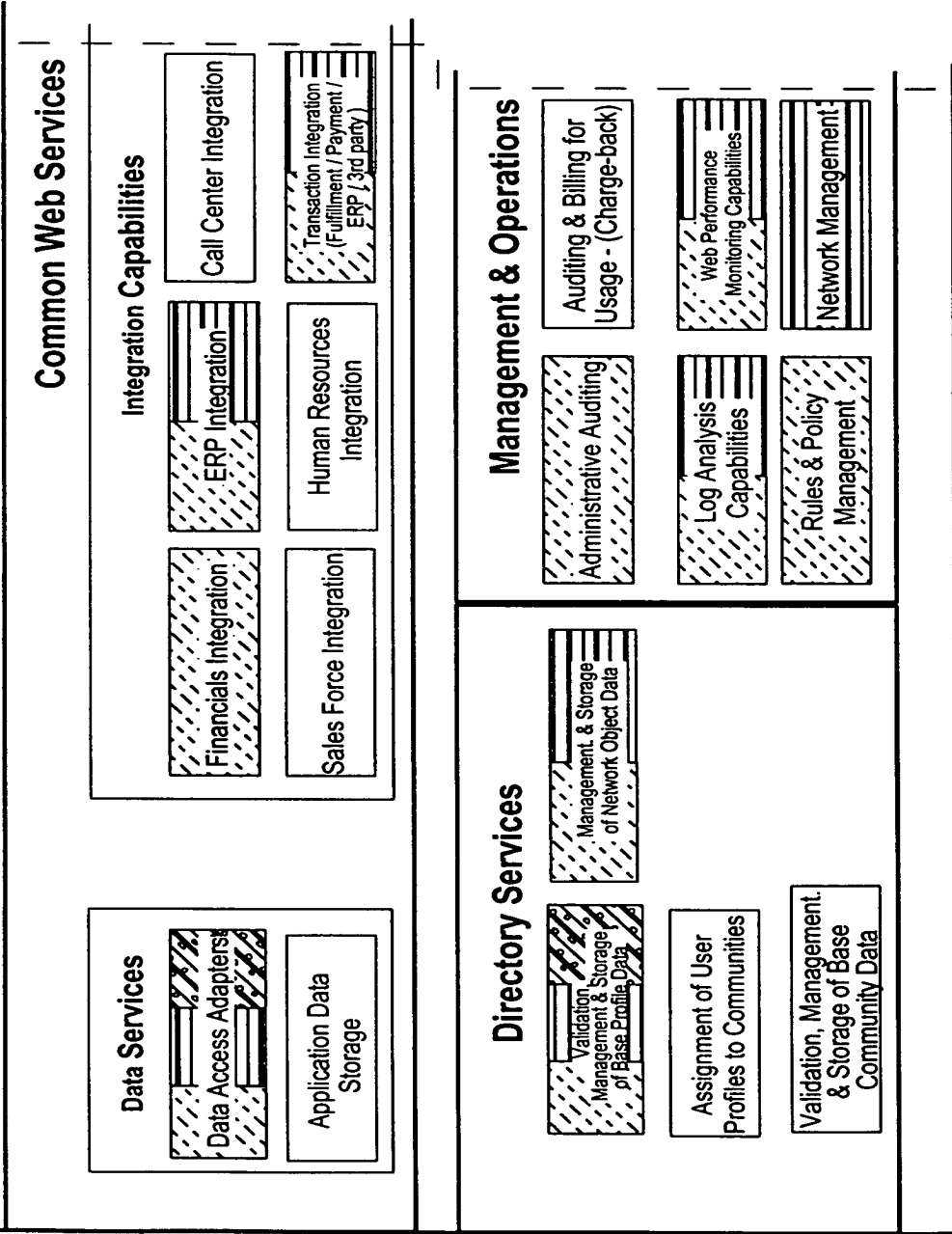
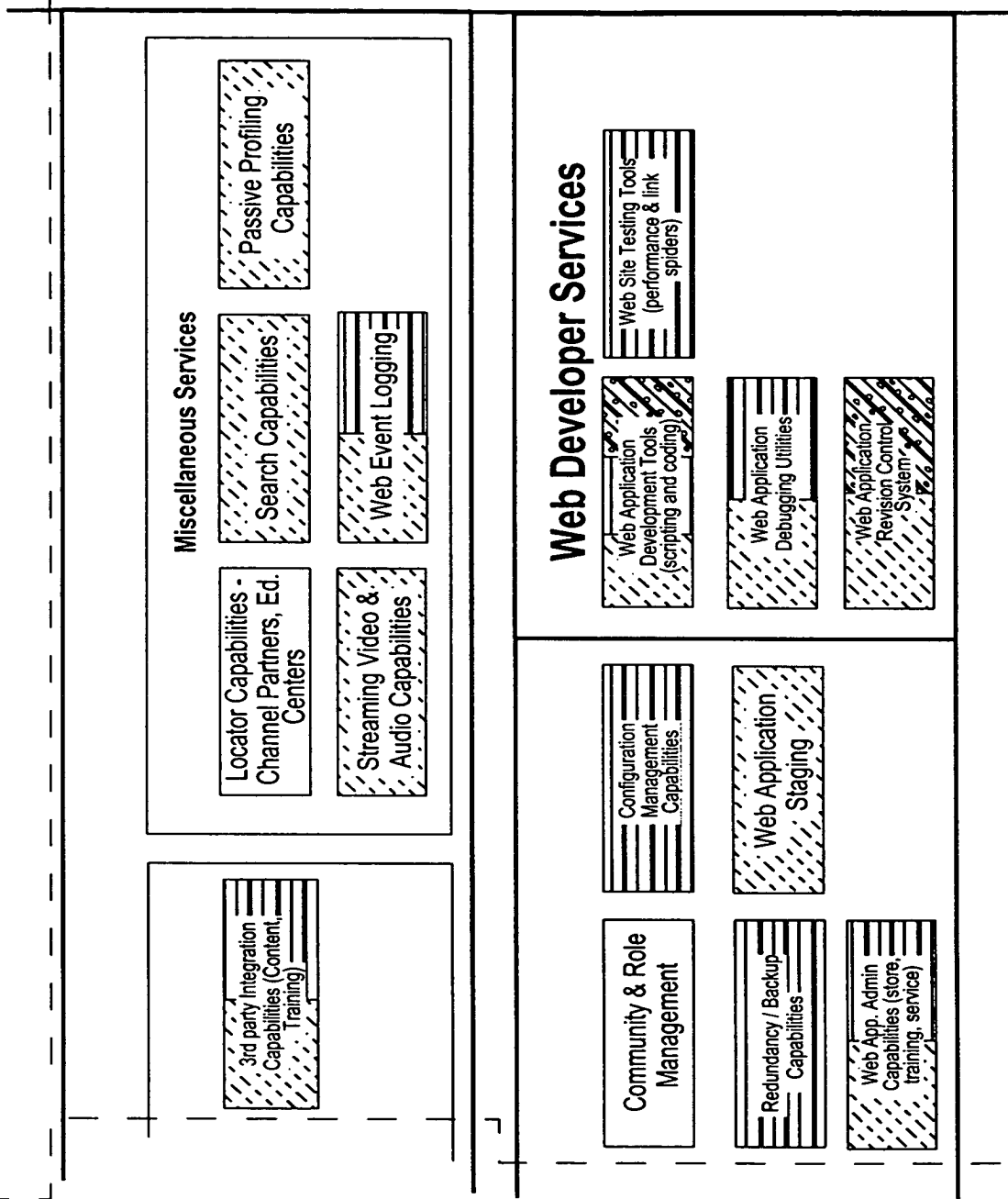


Fig. 27f



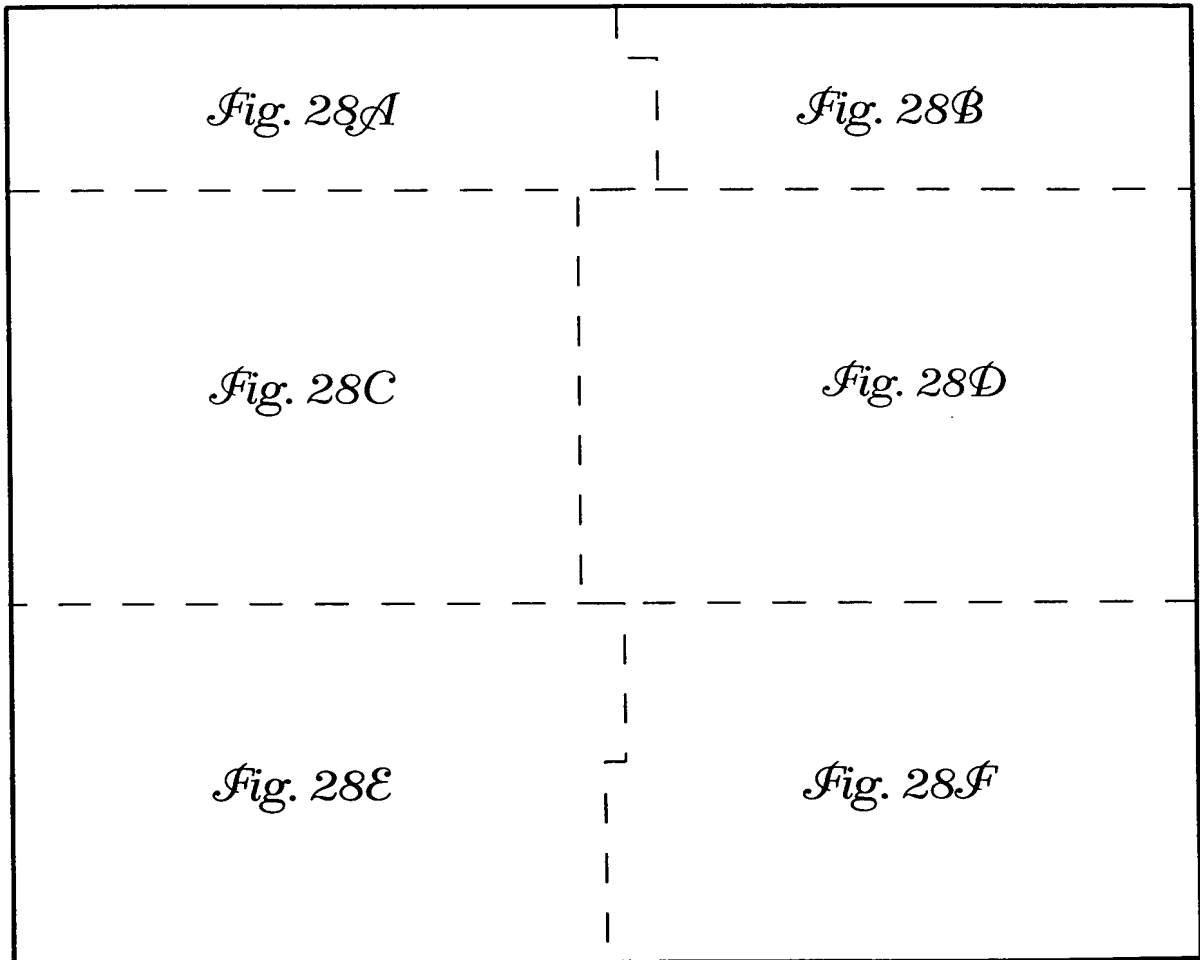


Fig. 28

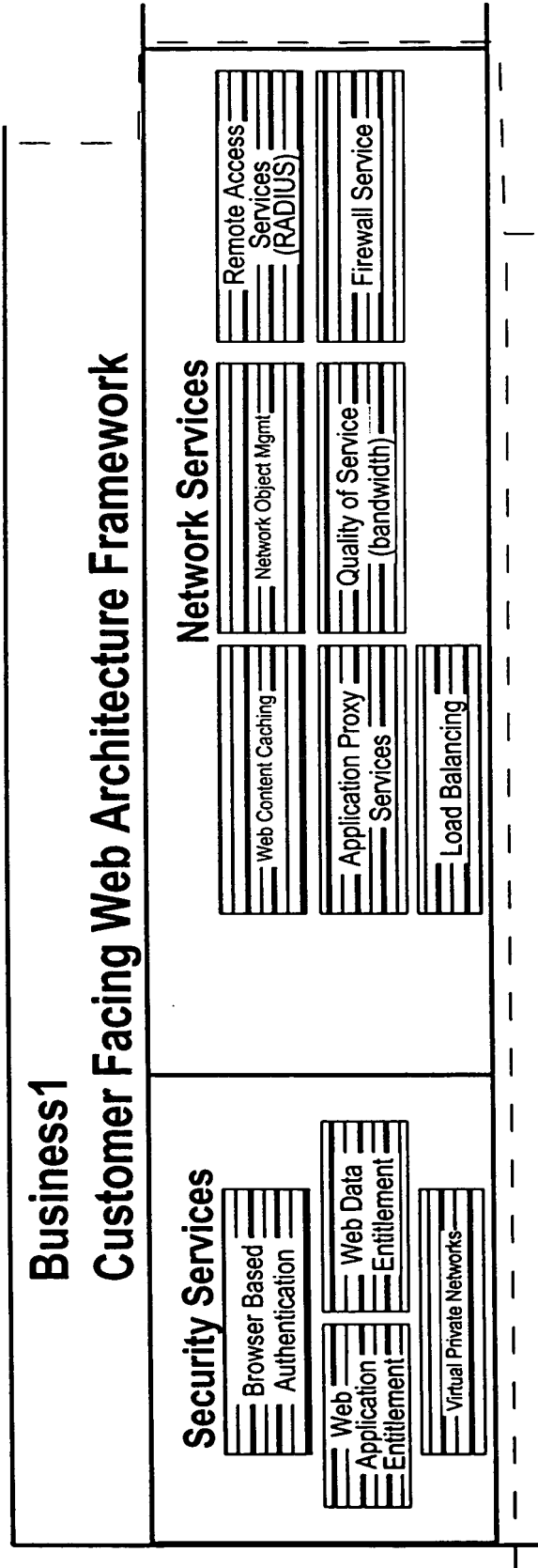


Fig. 28A

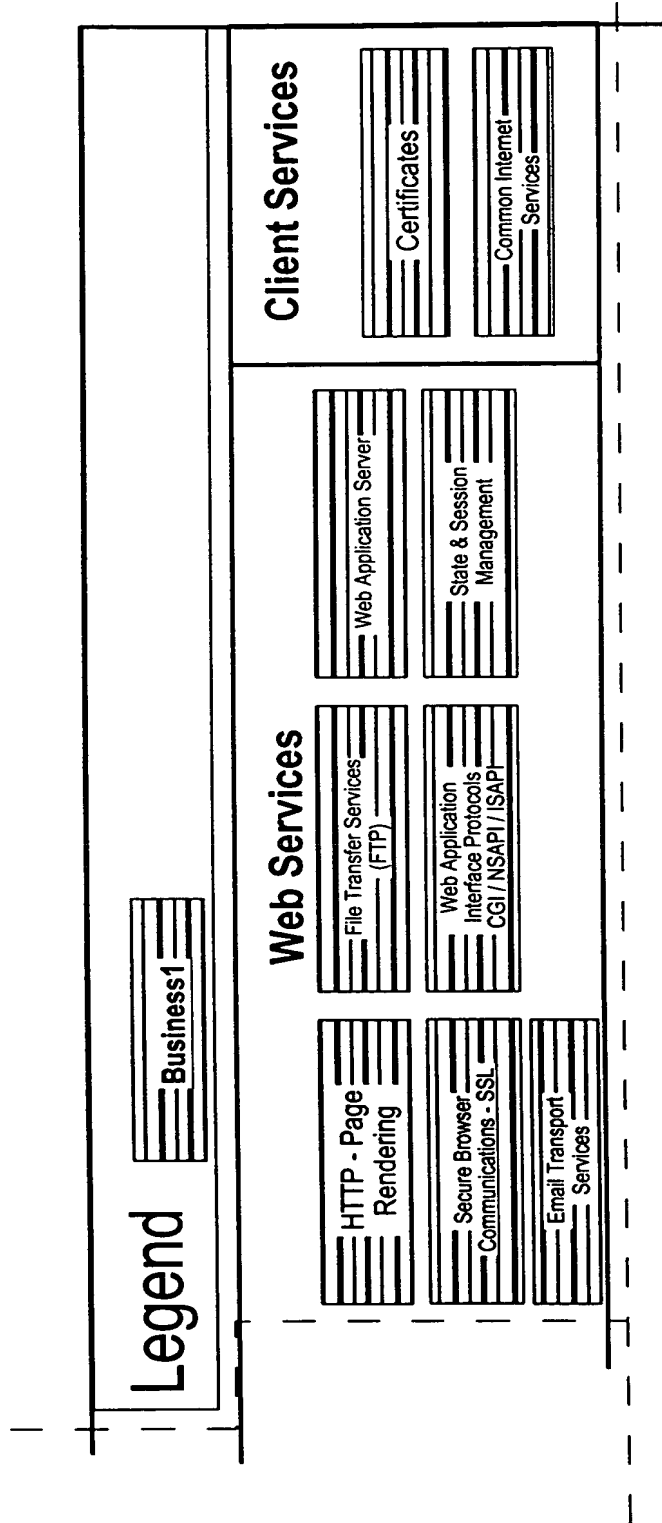


Fig. 28B

Web Application Services

Commerce

Catalog Capabilities
(products & services)

Product Details / Specs

Shopping Cart

Compare Products /
Services

Needs Assessment /
Buyer Assistant

Product Configurator

Advertisement &
Promotion Capabilities

Auction Capabilities

Quote (Price &
Availability)

Order Placement

Tax & Shipping
Calculations

Transaction Processing
Capabilities (physical &
electronic)

Electronic License
Distribution &
Management

Order Status / Order
History

Lead Generation &
Referral

Content Channels

Download Capabilities

Push Technology
Capabilities

Discussion Forums
(newsgroups)

Content Subscriptions

FAQs

Chat Capabilities
(Real-time)

Generate Coordinated /
Targeted Messages
(outbound email)

Manage Email Receipt
& Delivery (inbound
email)

Dynamic Rendering
(template based
publishing)

Administrative & Miscellaneous

Shareholder Services

On-line Recruiting

Legal Services

Fig. 28C

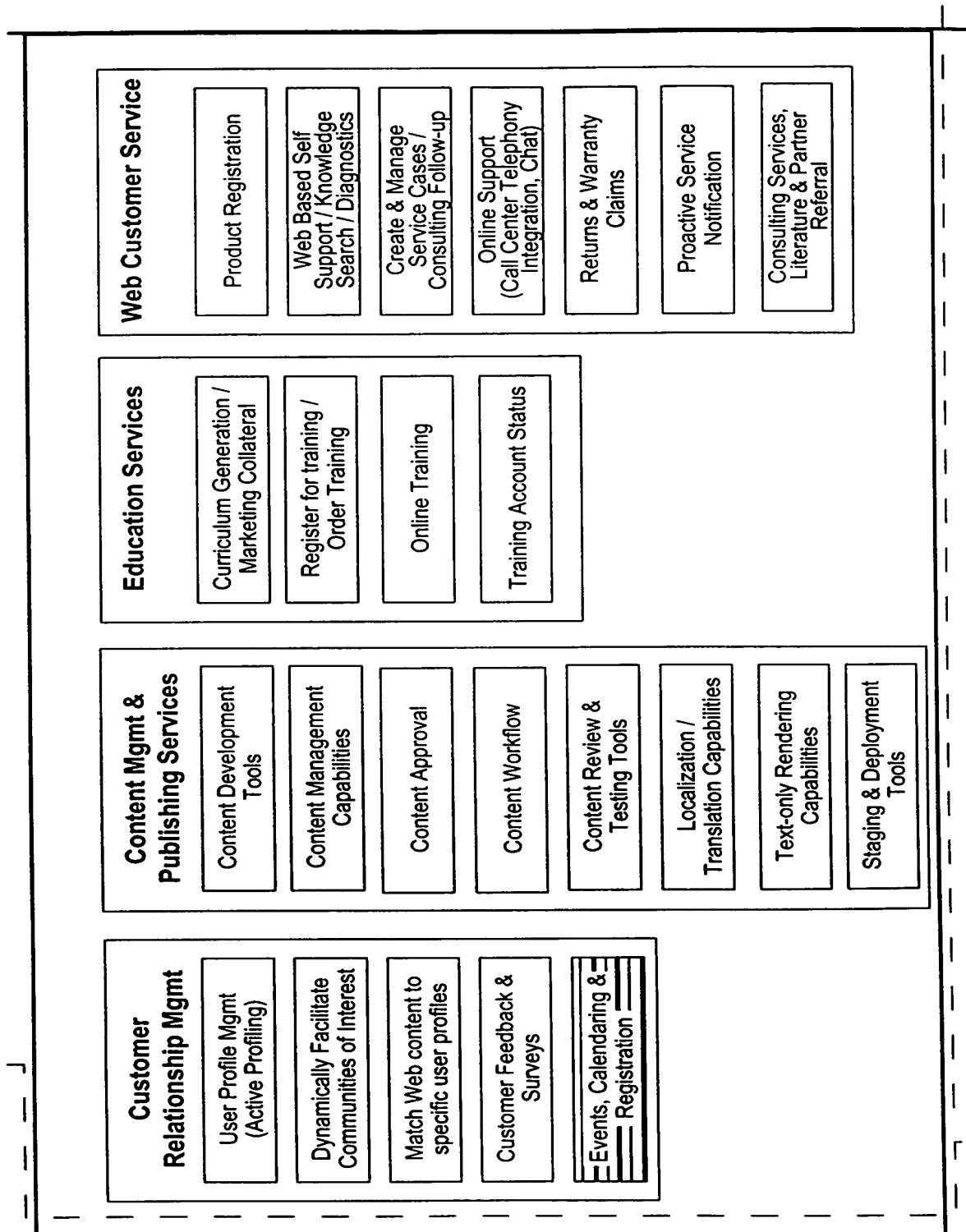


Fig. 28D

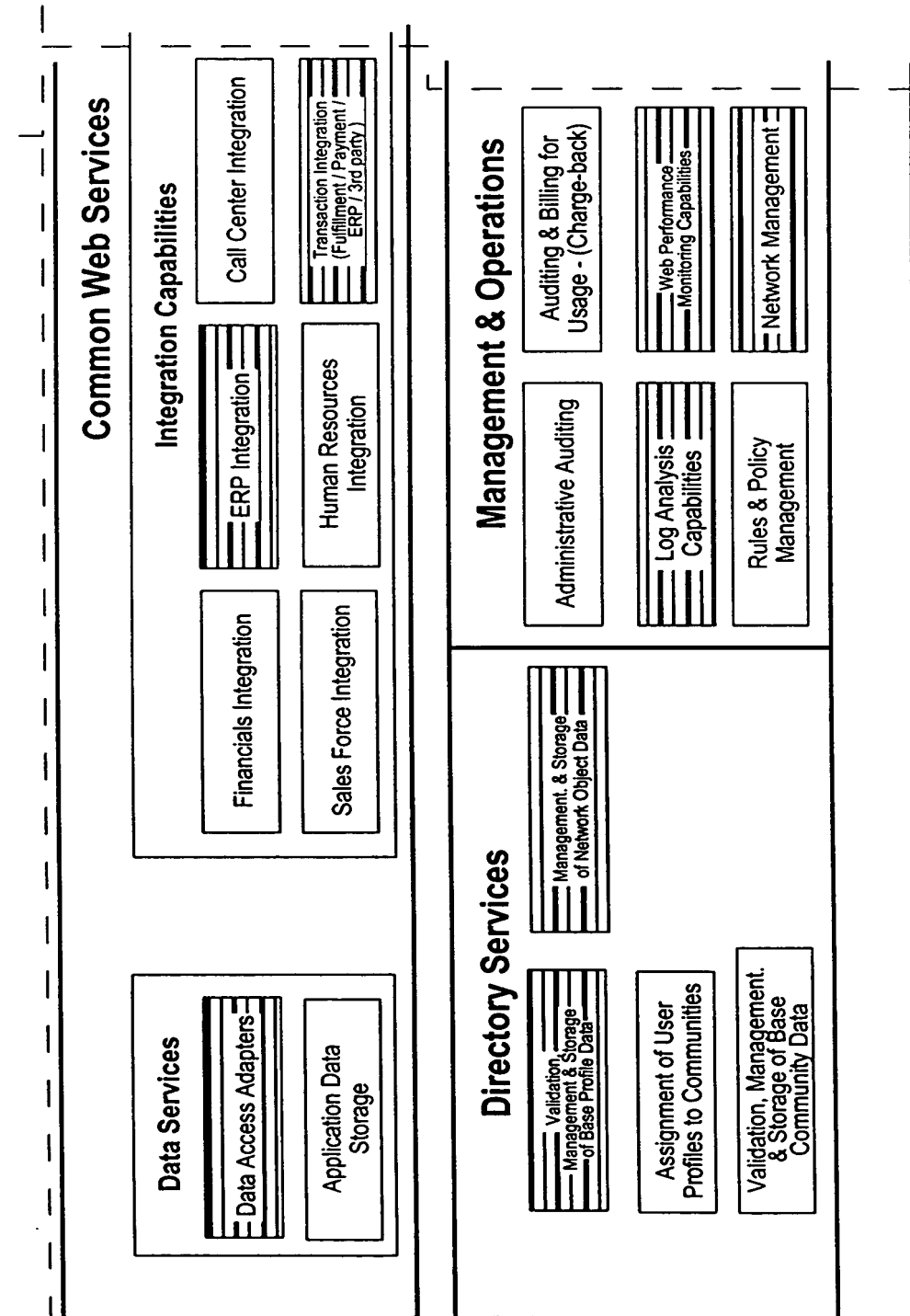


Fig. 28E

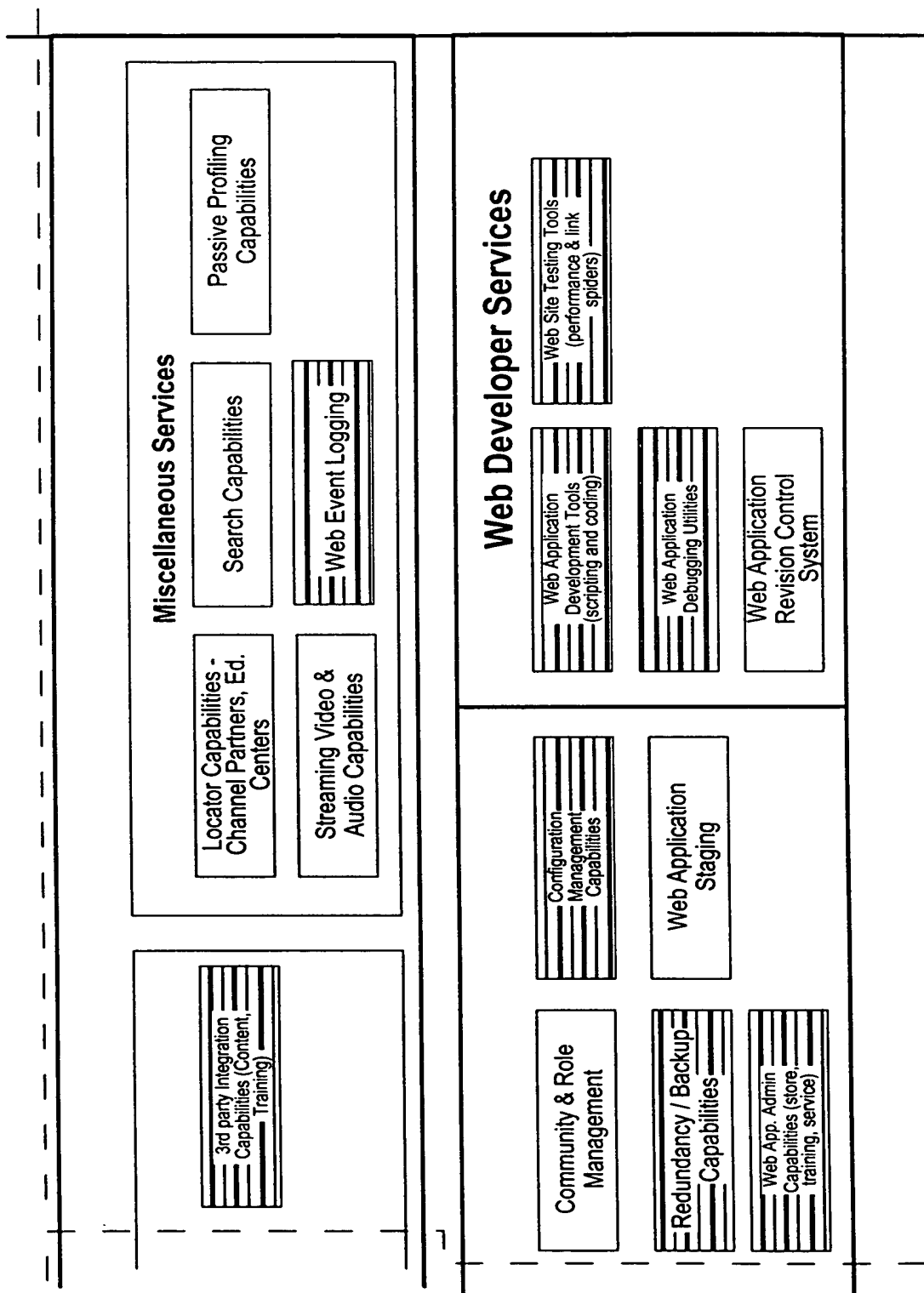


Fig. 28F

REPLACEMENT SHEET

Inventor: GUHEEN ET AL.

Docket No.: 8567.111USC1

Title: BUSINESS ALLIANCE IDENTIFICATION IN A WEB ARCHITECTURE
FRAMEWORK (AS AMENDED HEREIN)

Attorney Name: JEFFREY P. COOK

Phone No.: 612.332.5300

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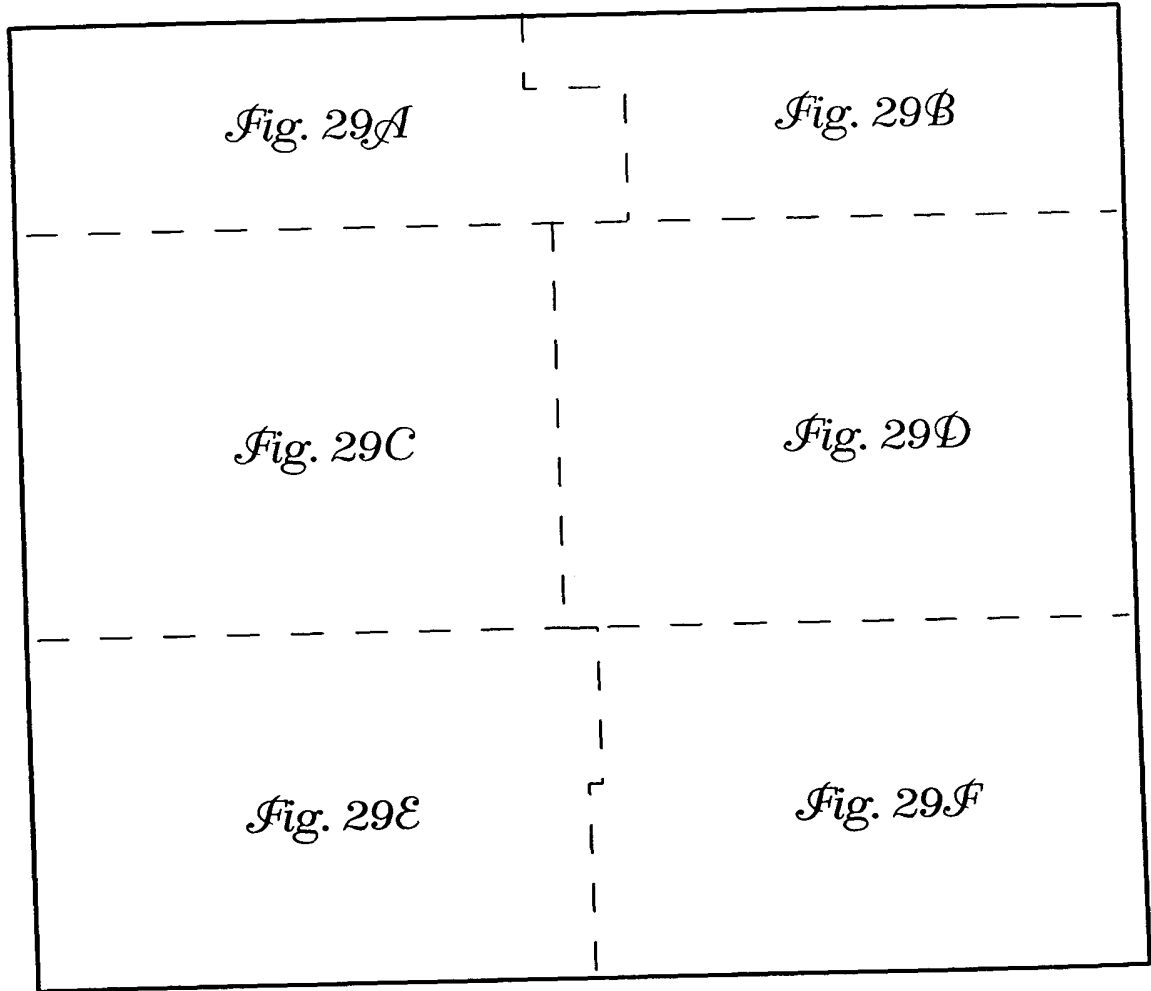


Fig. 29

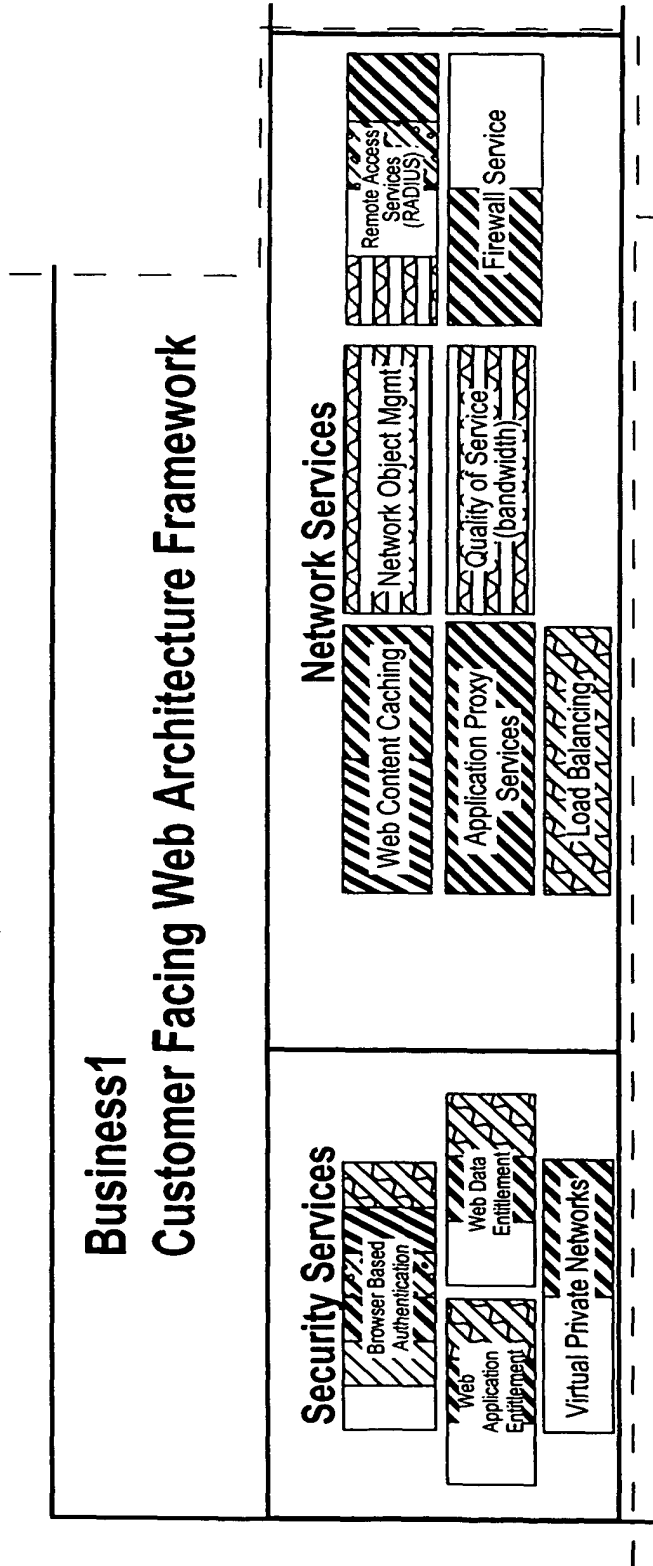


Fig. 29A

REPLACEMENT SHEET

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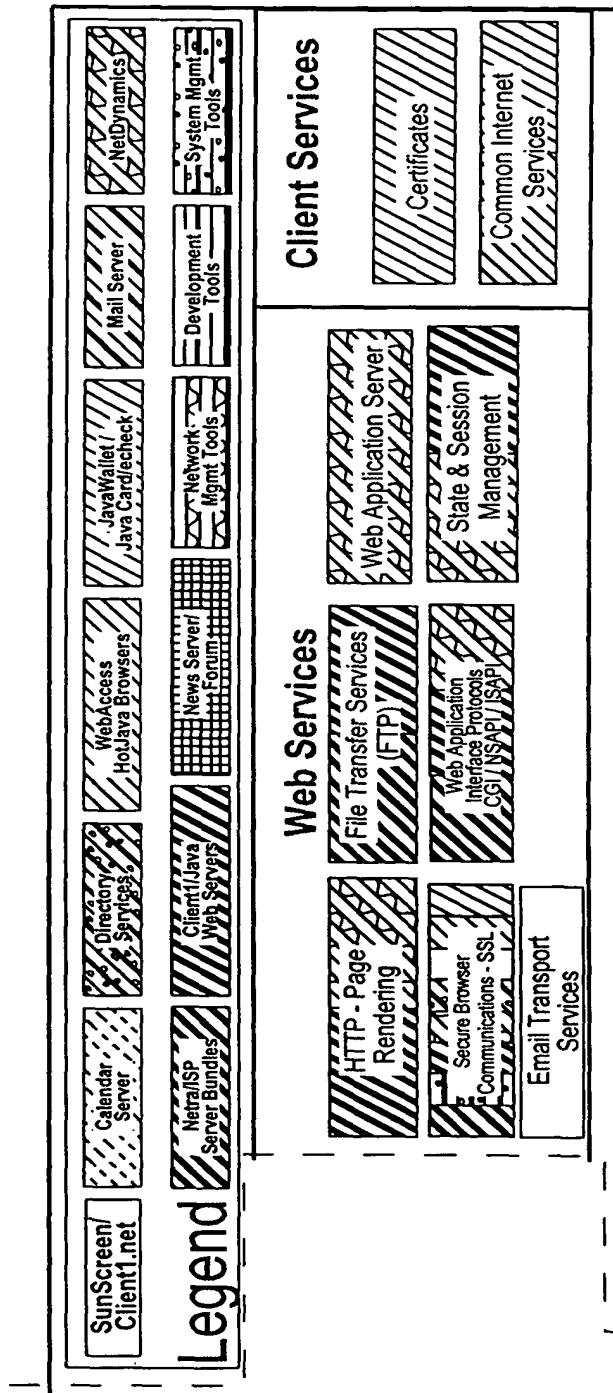


Fig. 29B

Web Application Services

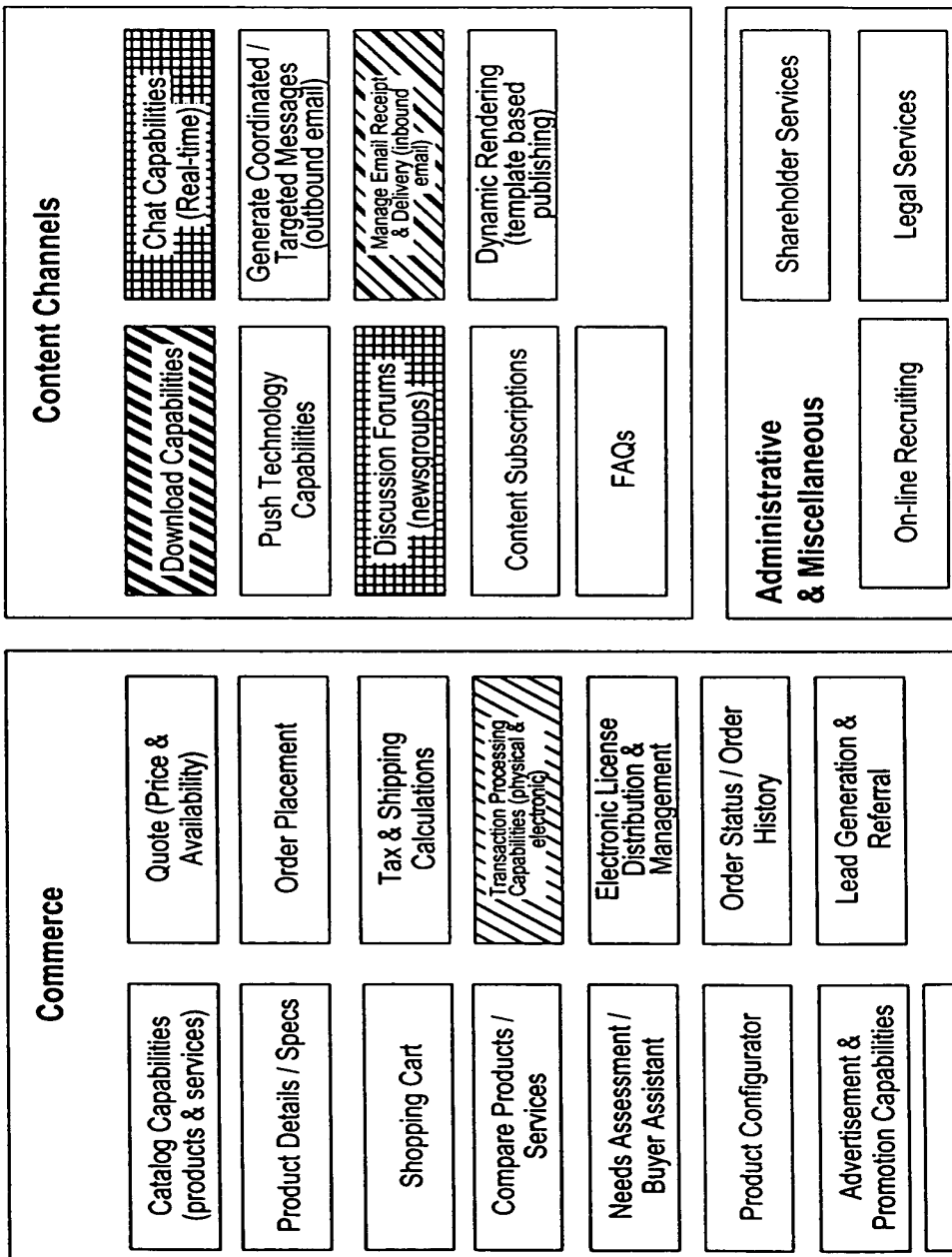


Fig. 29C

REPLACEMENT SHEET

Inventor: GUHEEN ET AL. Docket No.: 8567.111USC1
Title: BUSINESS ALLIANCE IDENTIFICATION IN A WEB ARCHITECTURE
FRAMEWORK (AS AMENDED HEREIN)
Attorney Name: JEFFREY P. COOK
Phone No.: 612.332.5300
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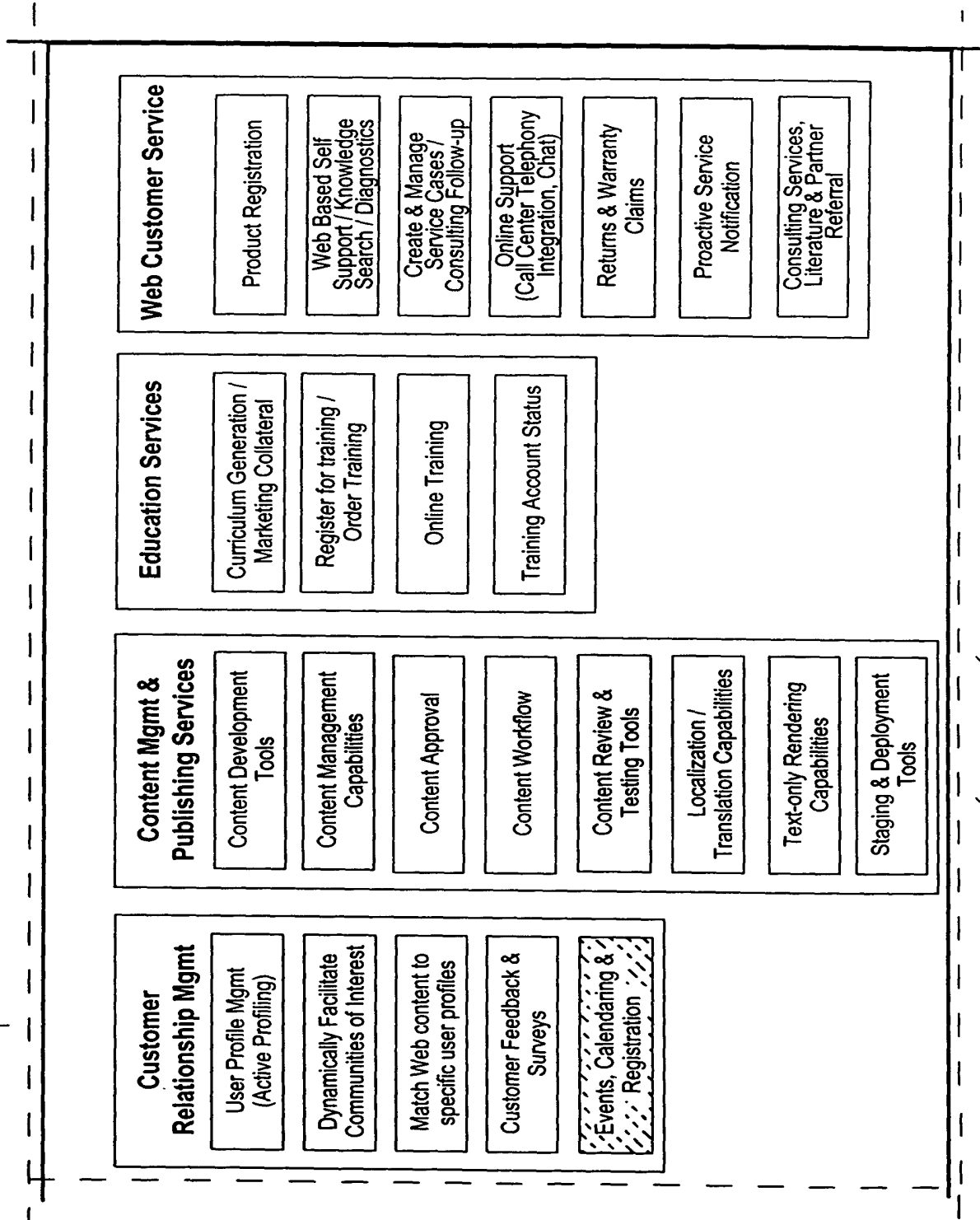


Fig. 29D

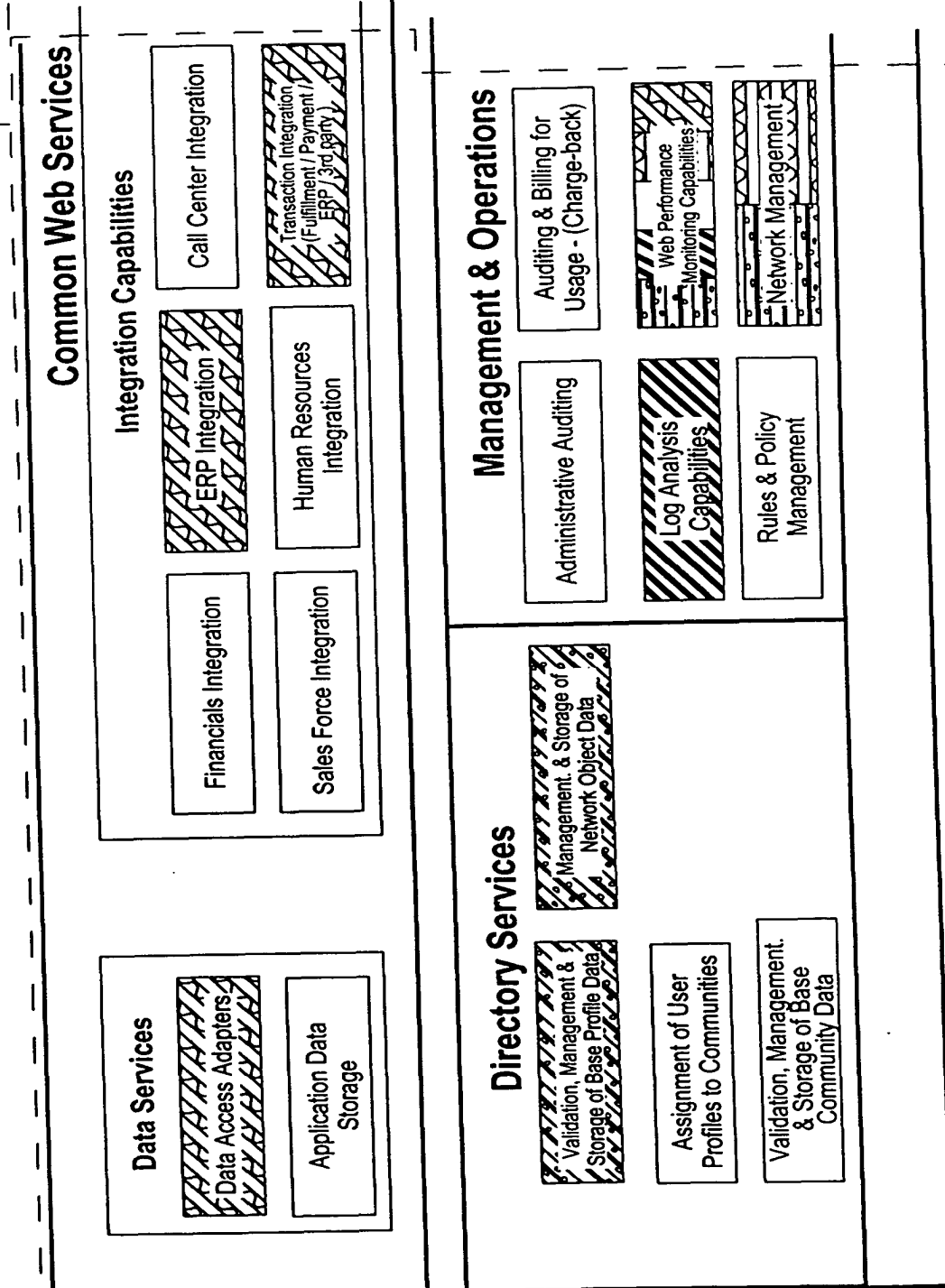


Fig. 29E

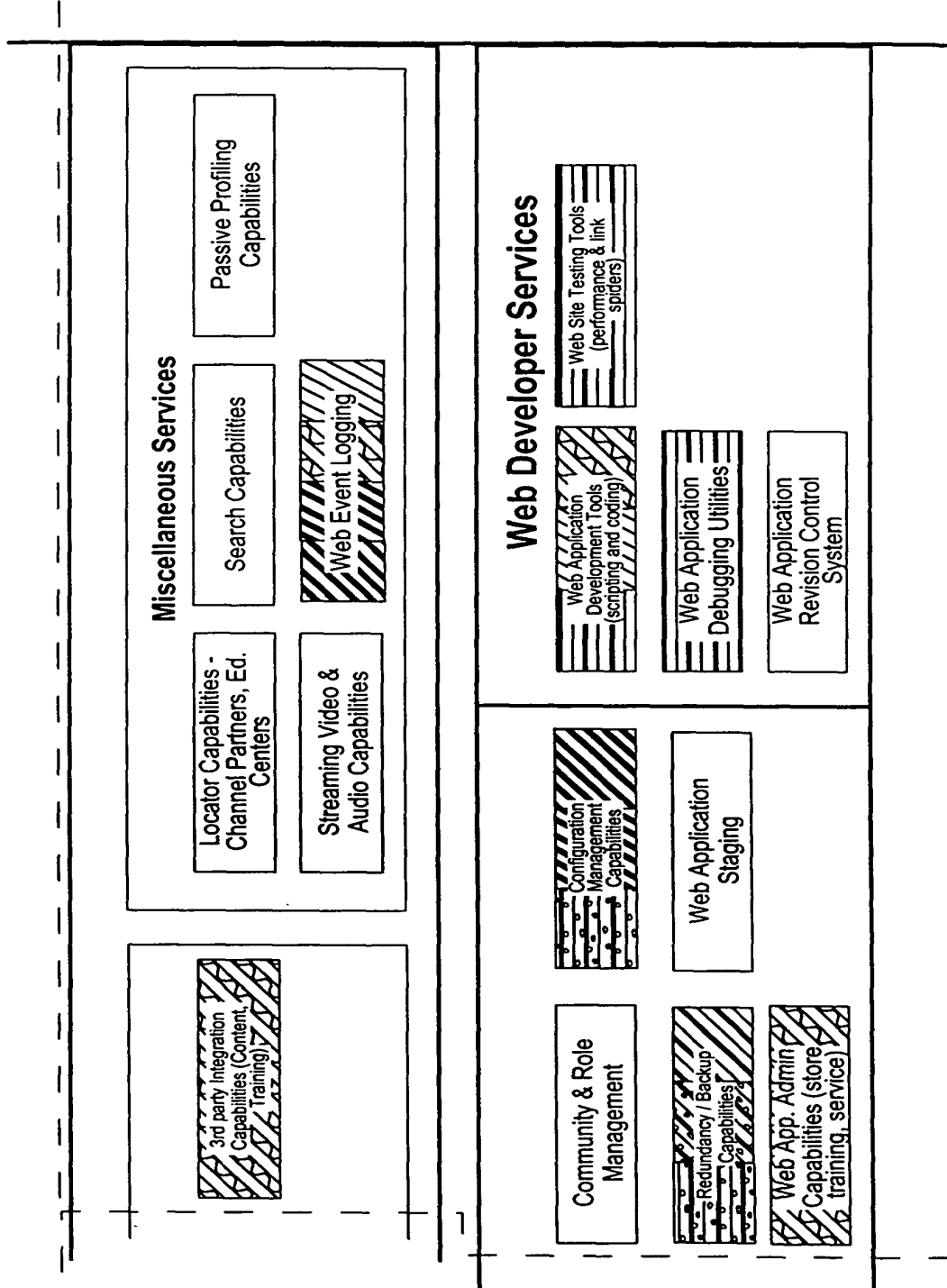


Fig. 29F

REPLACEMENT SHEET

Inventor: GUHEEN ET AL.

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Phone No.: 612.332.5300

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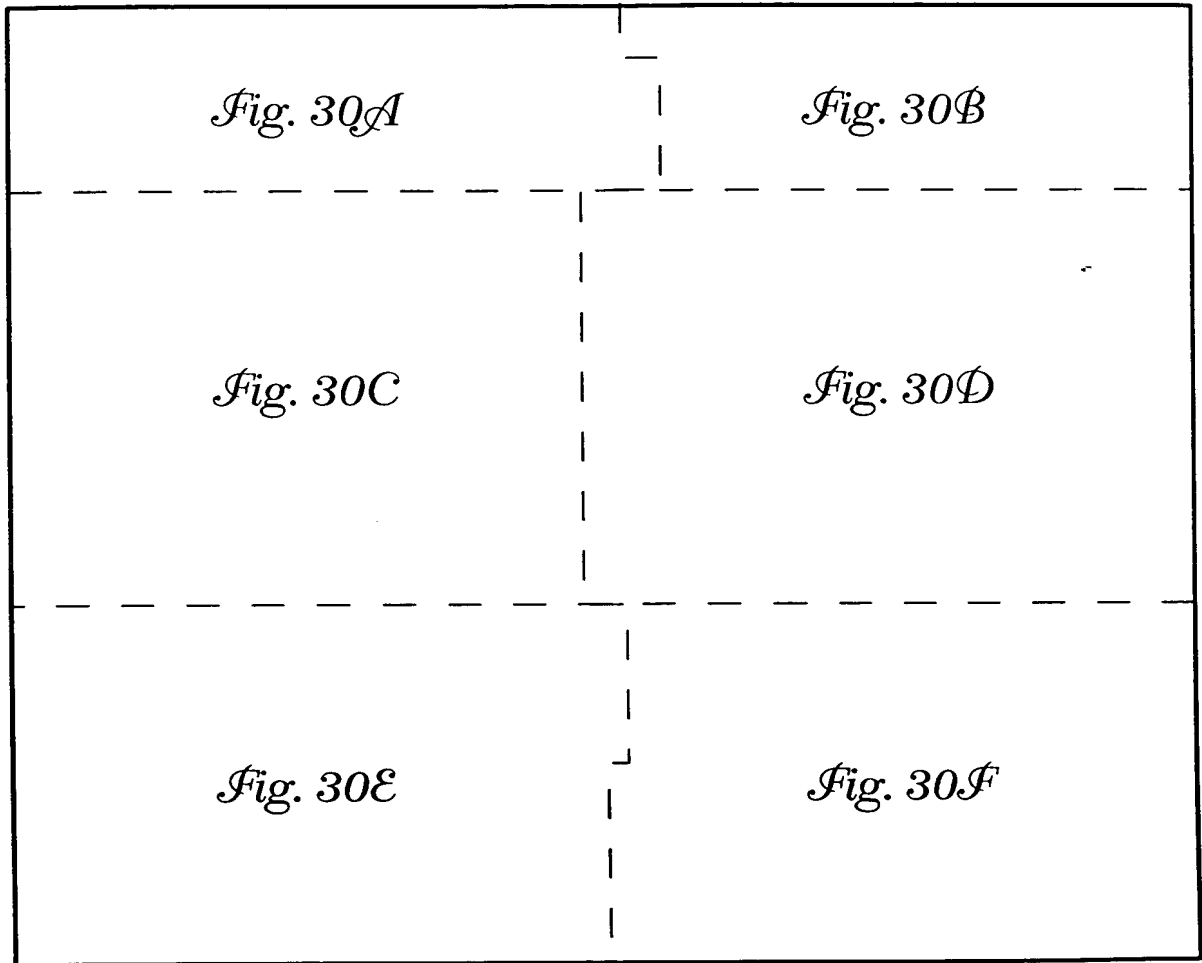


Fig. 30

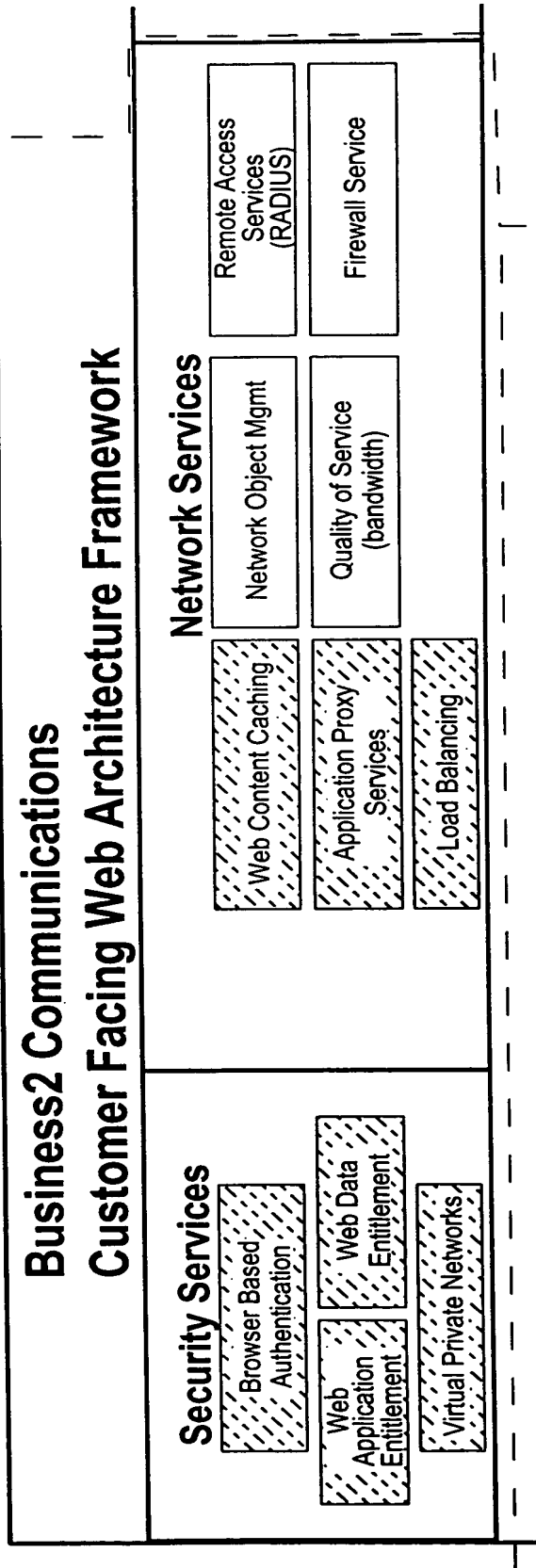


Fig. 30A

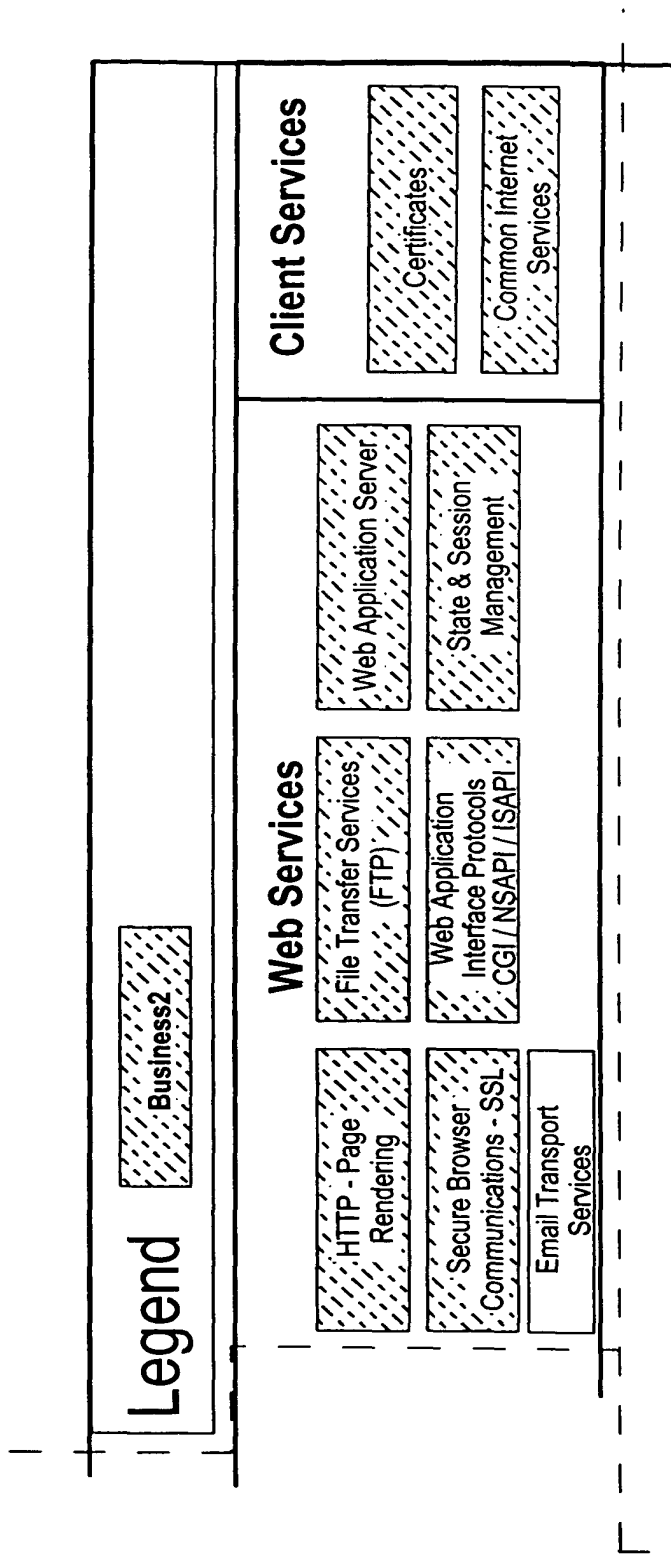


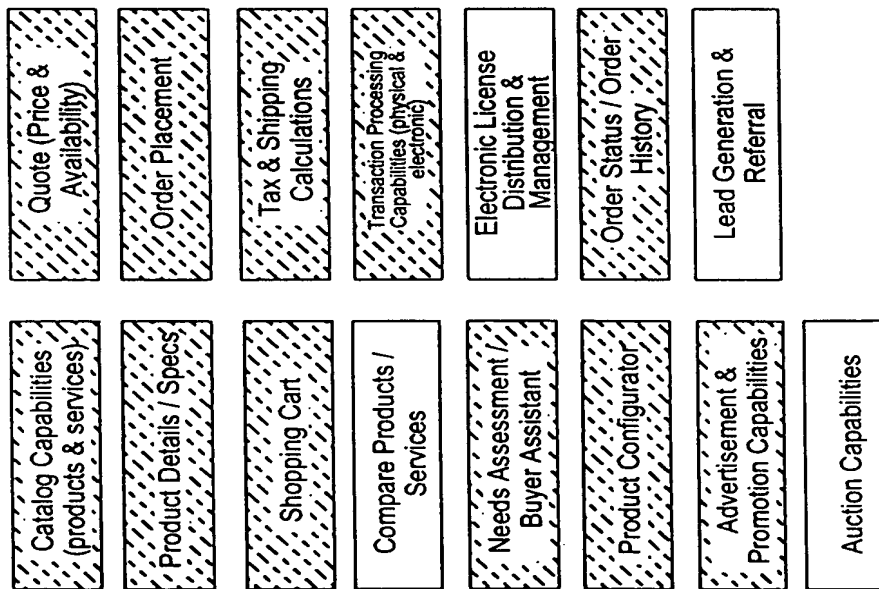
Fig. 30B

REPLACEMENT SHEET

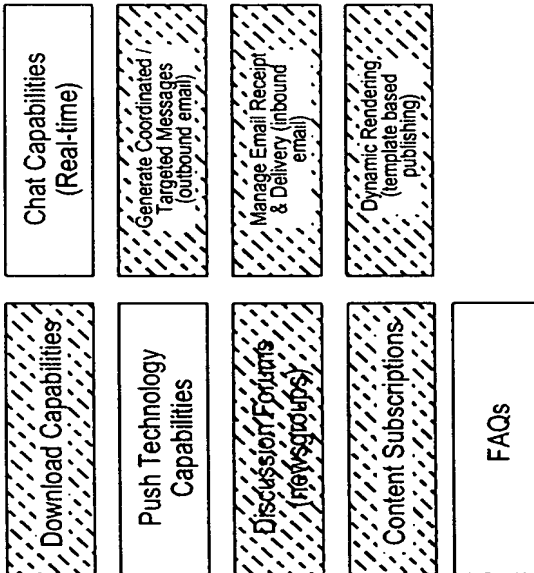
Inventor: GUHEEN ET AL. Docket No.: 8567.111USC1
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Web Application Services

Commerce



Content Channels



**Administrative
& Miscellaneous**

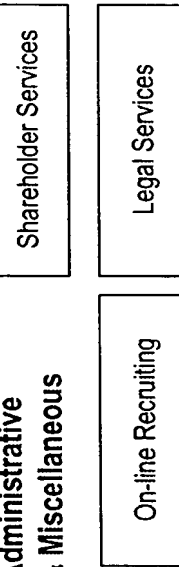


Fig. 30C

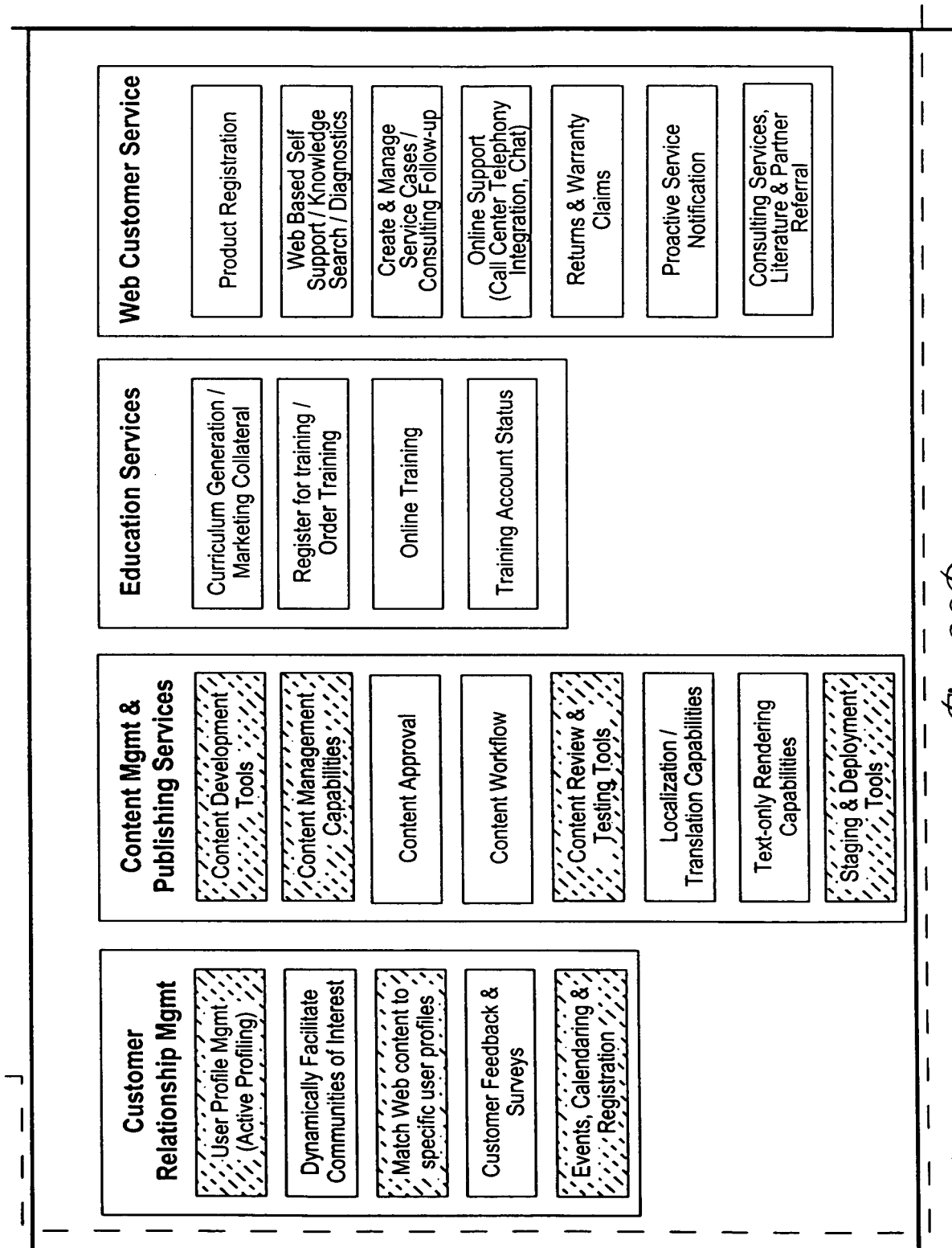


Fig. 30D

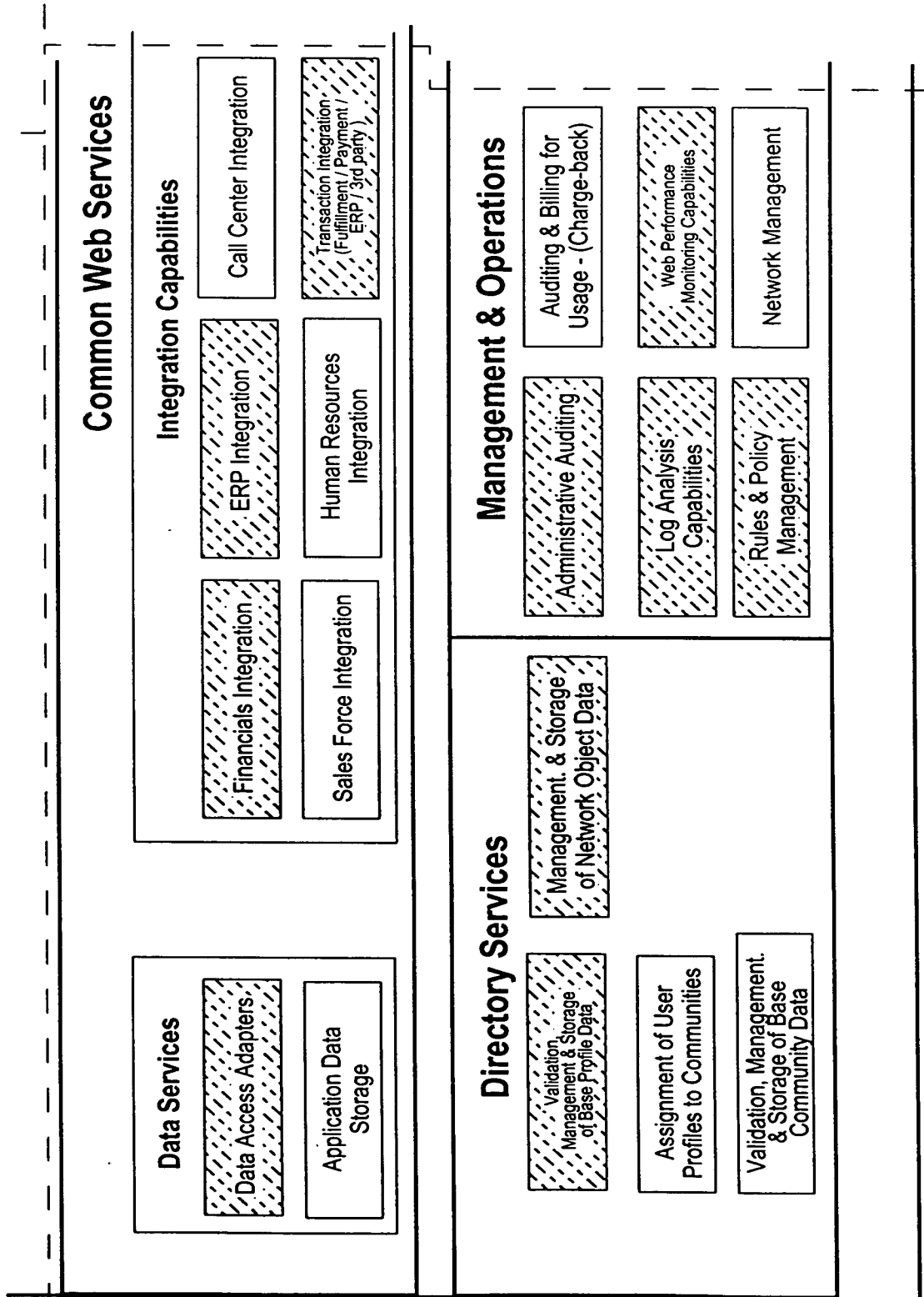


Fig. 30E

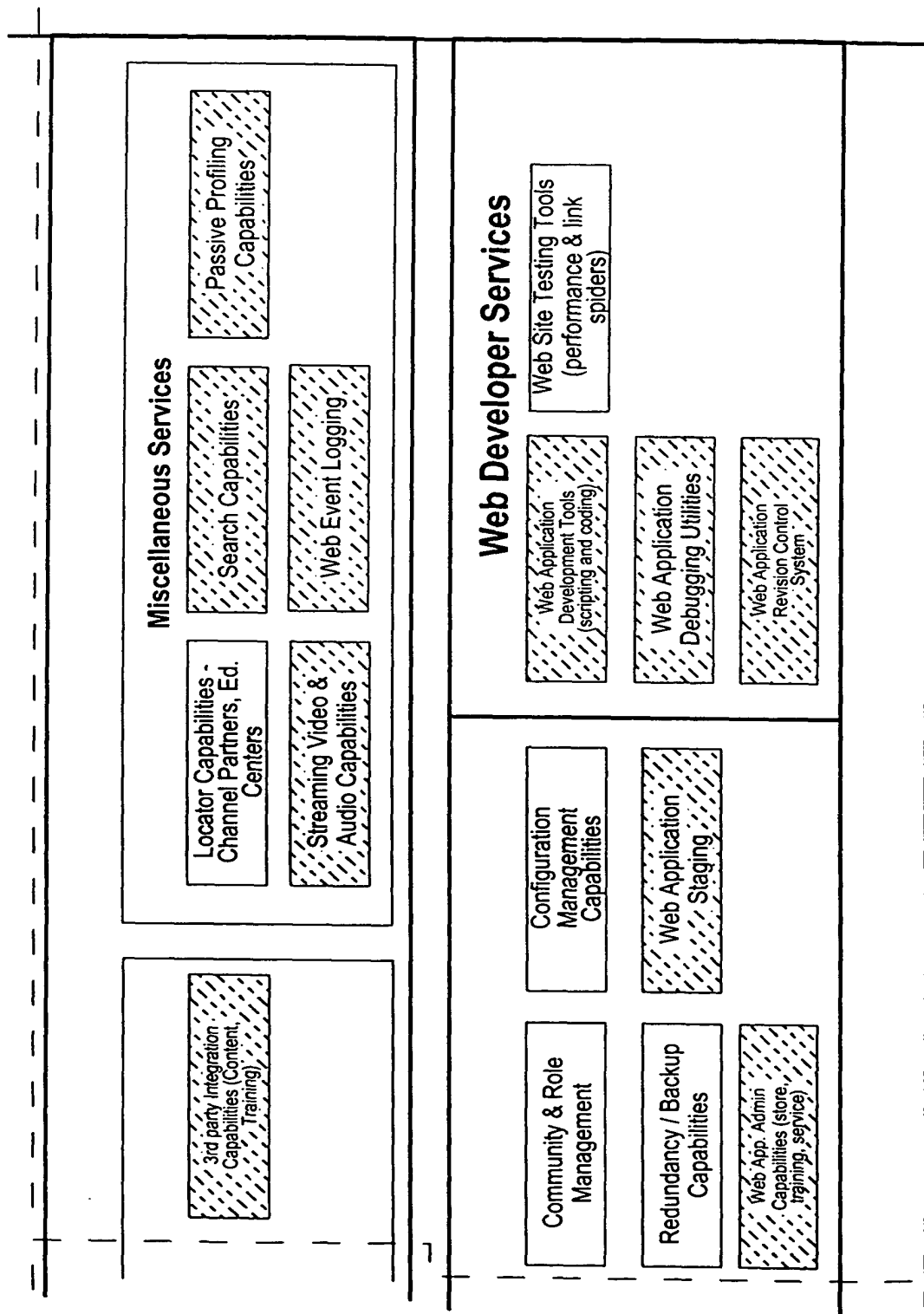


Fig. 30.F

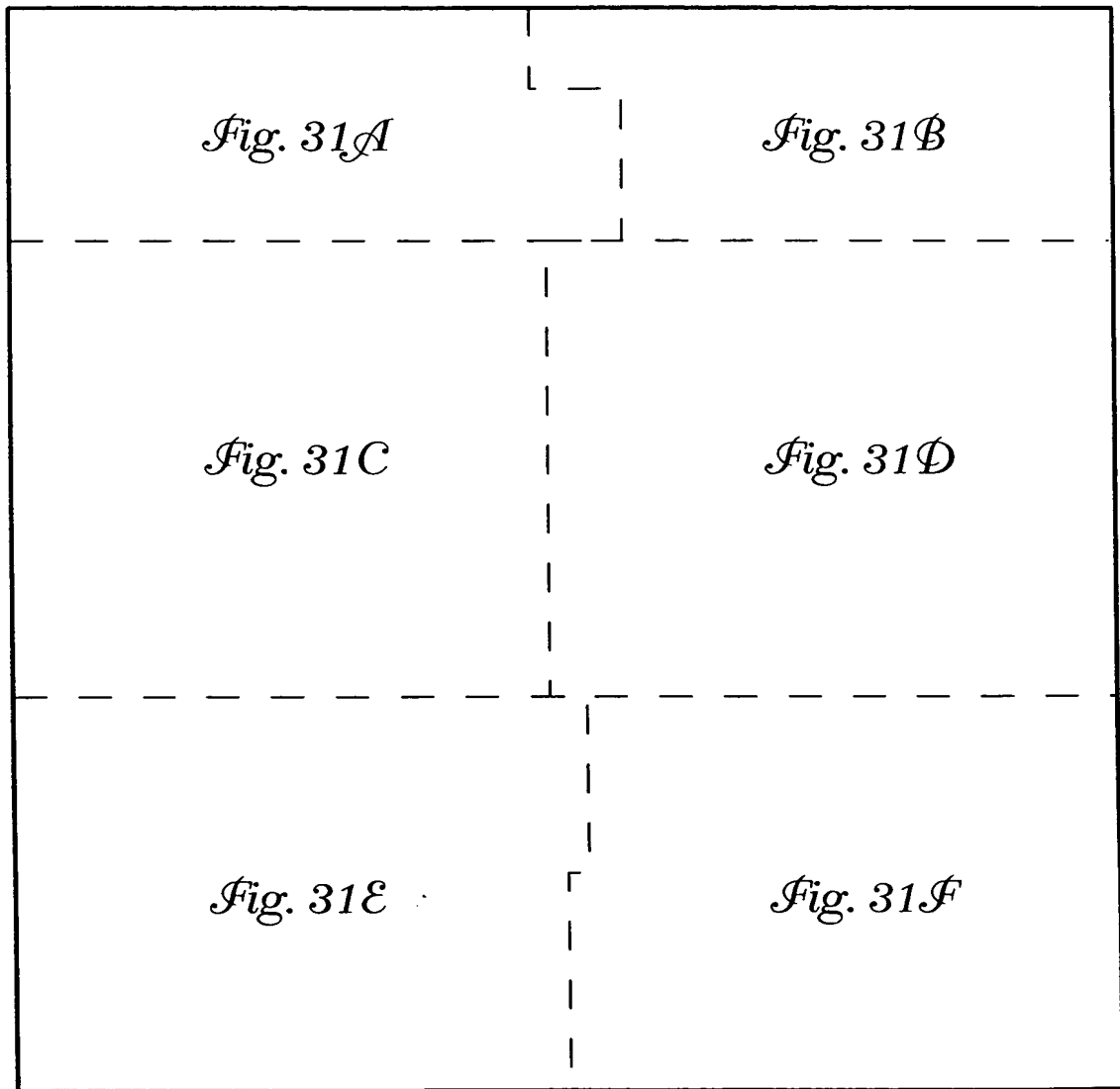


Fig. 31

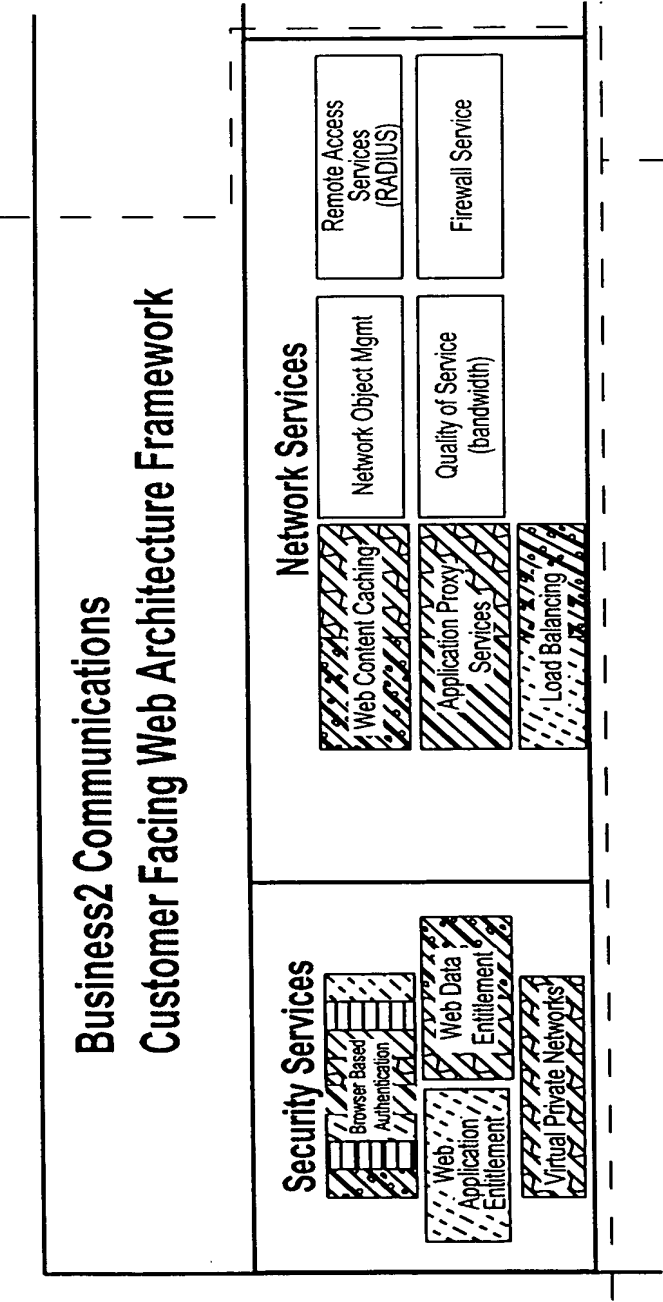


Fig. 31A

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Inventor: GUHEEN ET AL.

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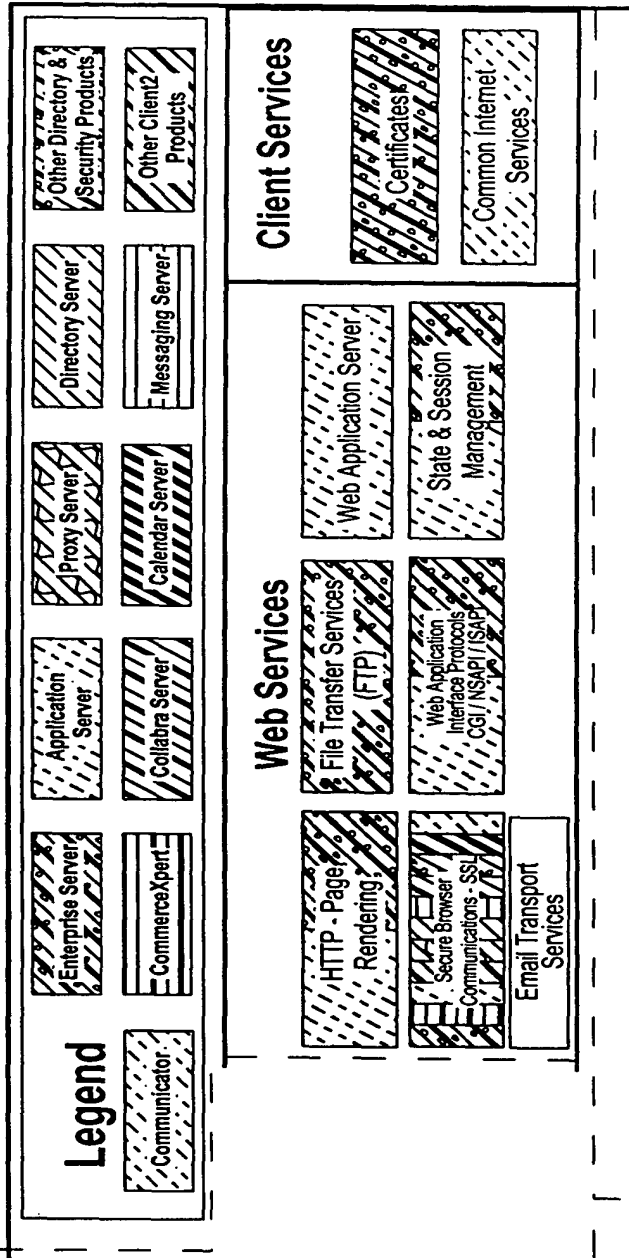


Fig. 31B

Web Application Services

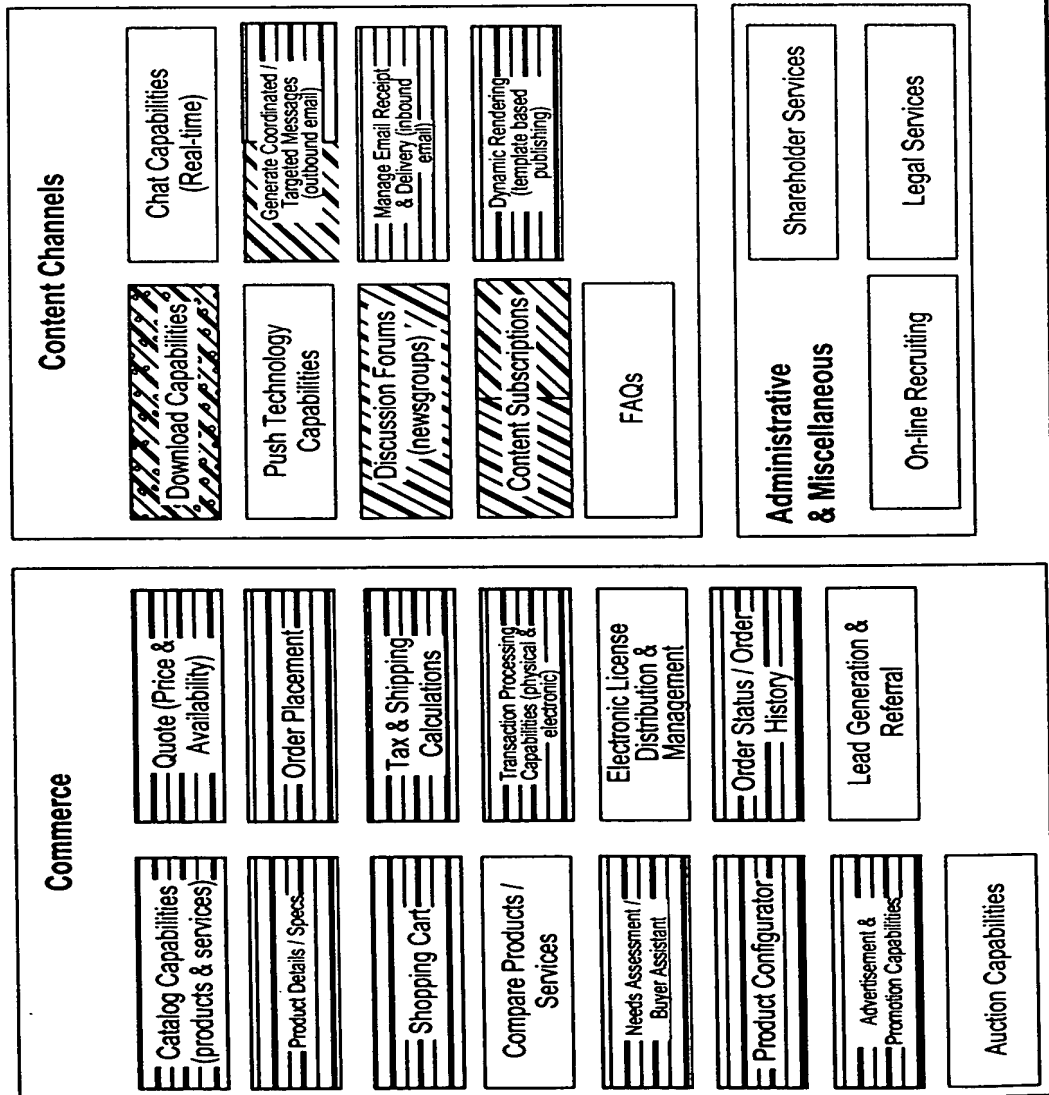


Fig. 31C

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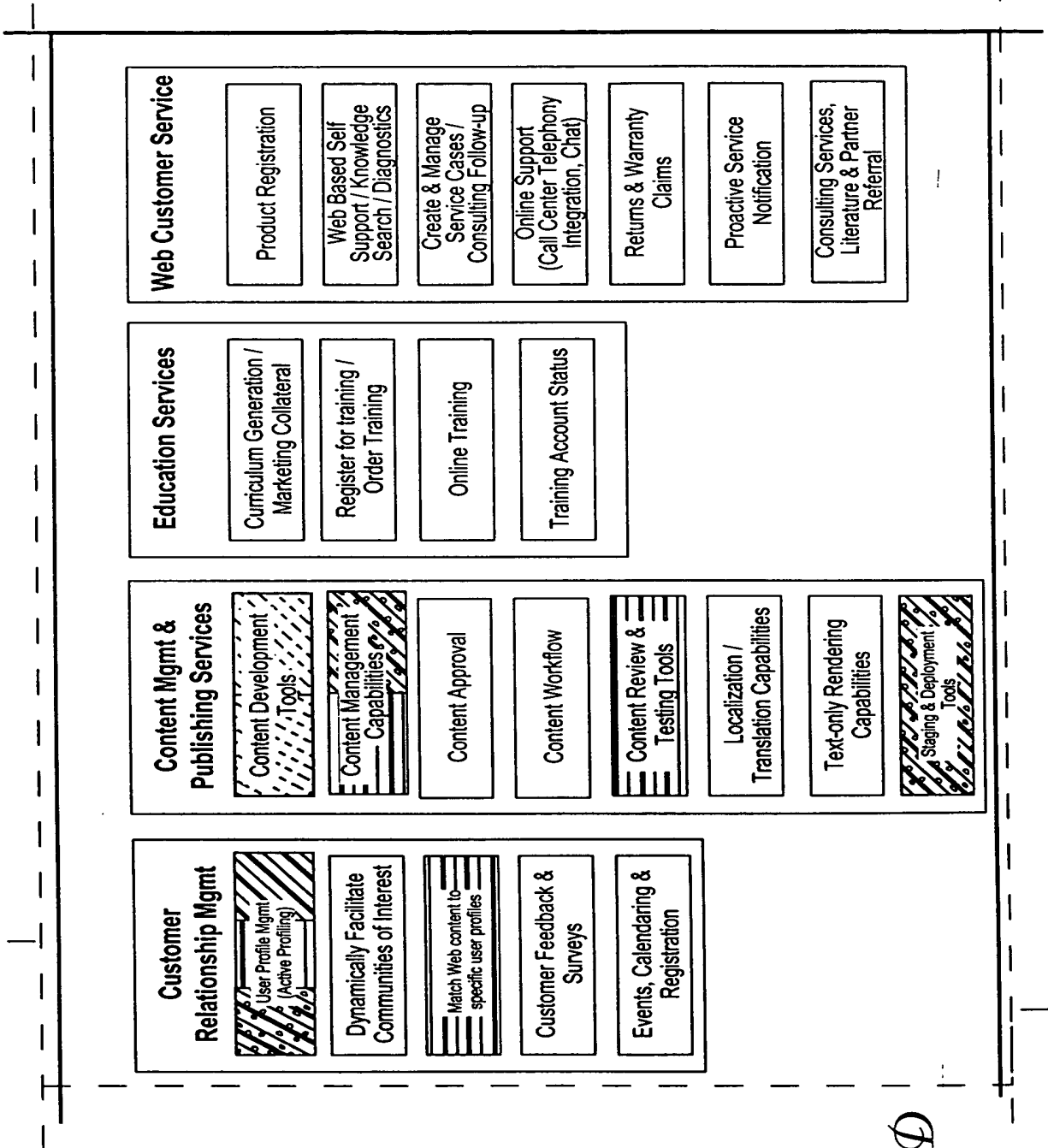


Fig. 31D

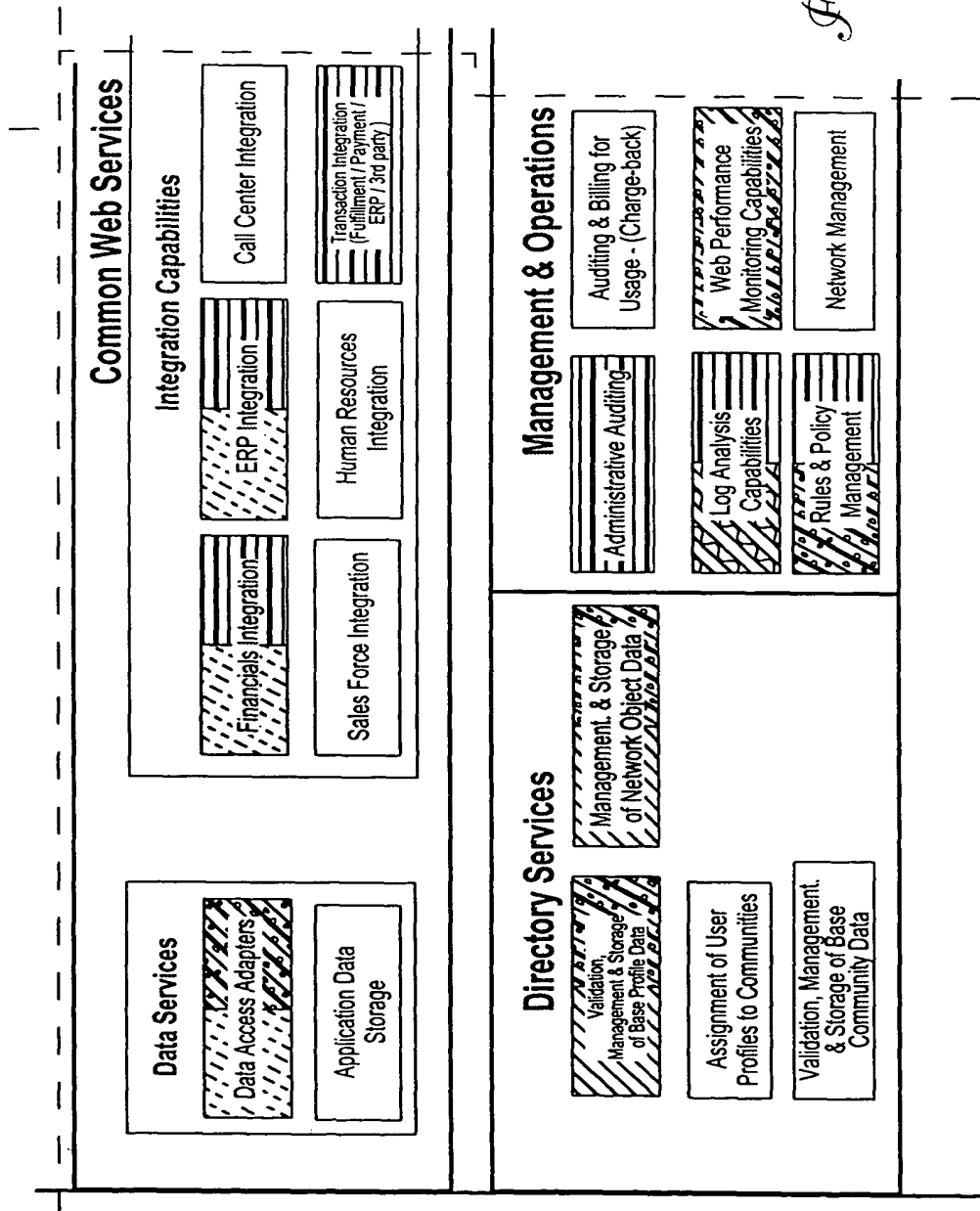


Fig. 31E

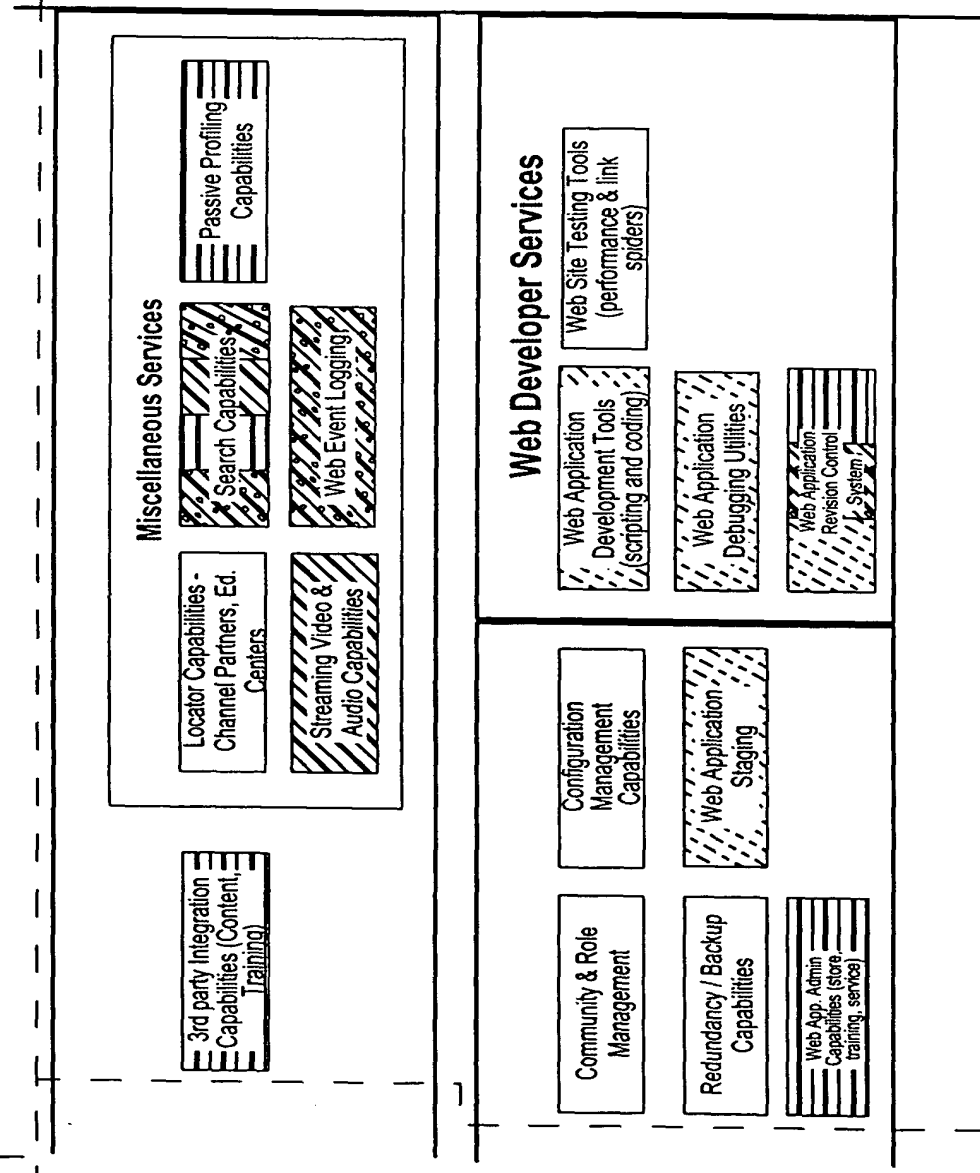


Fig. 31F

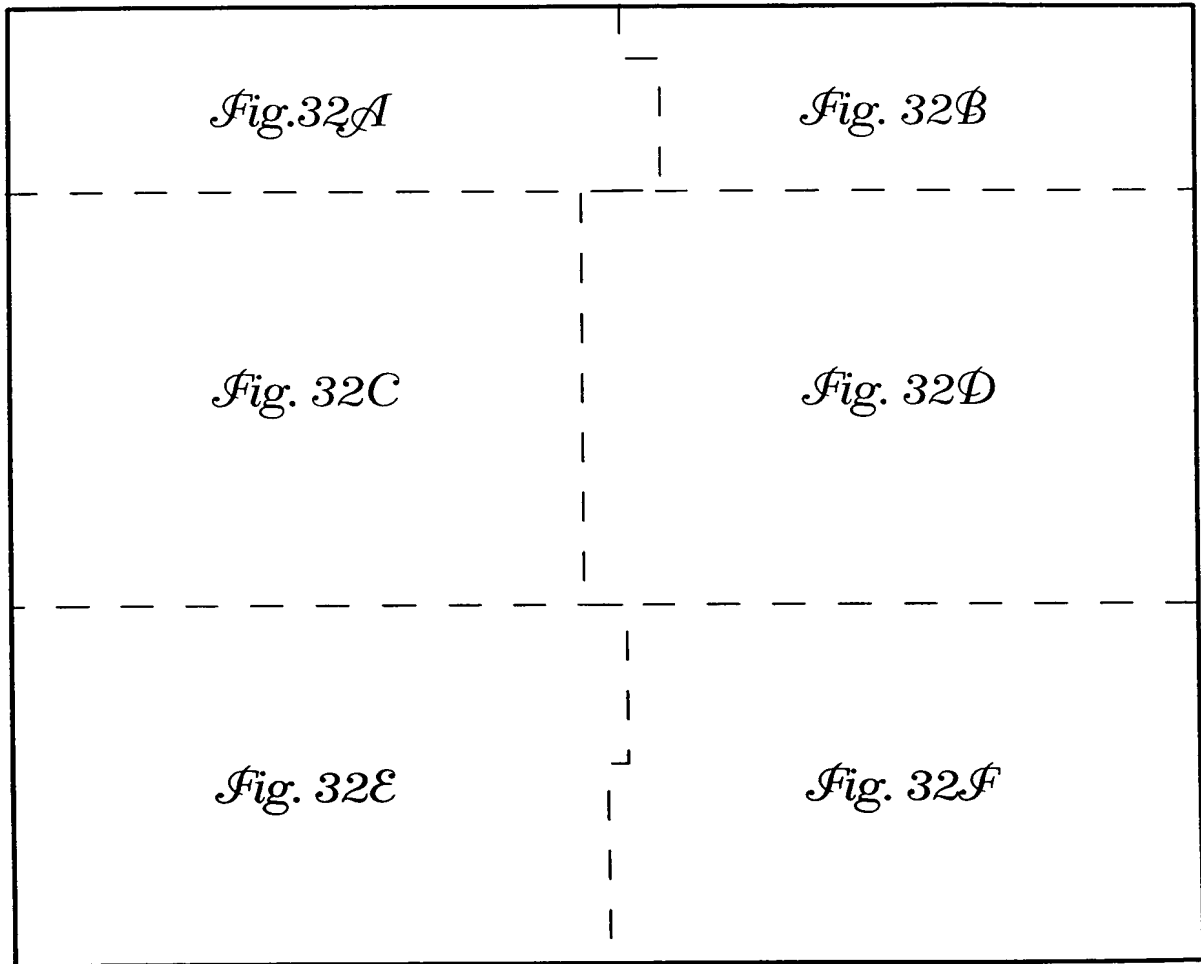


Fig. 32

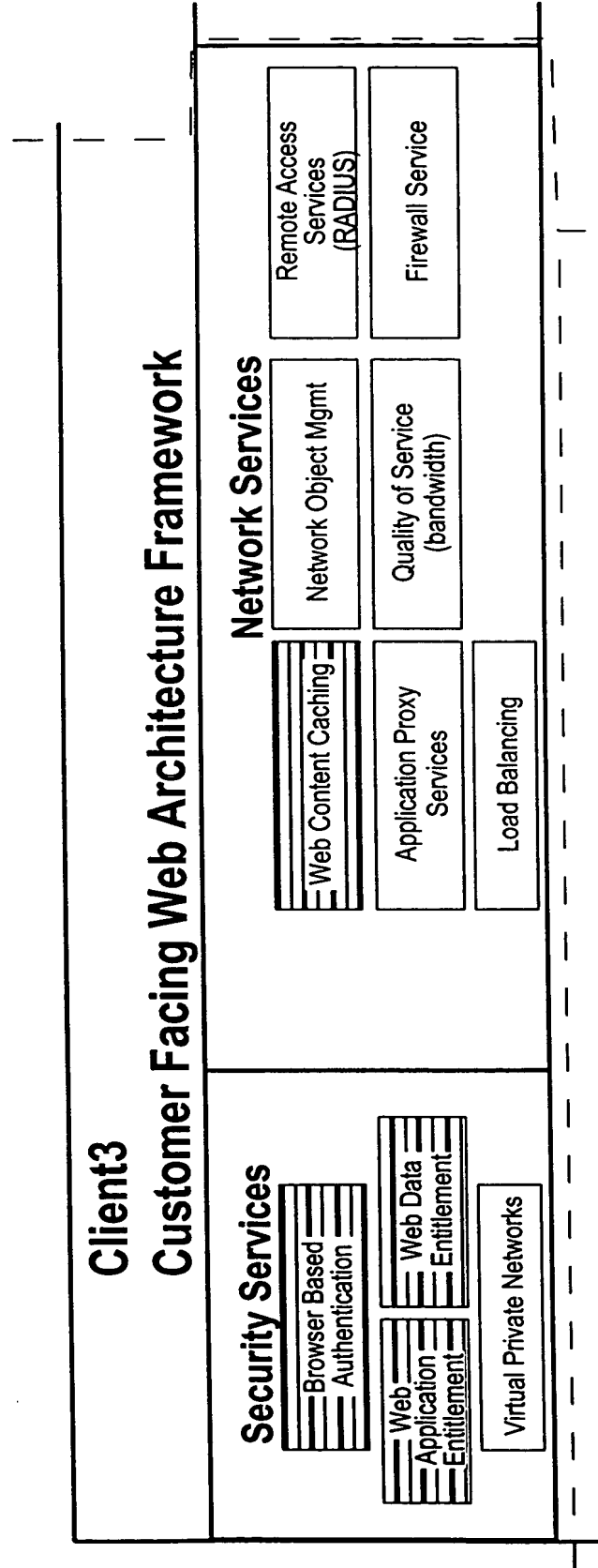


Fig. 32A

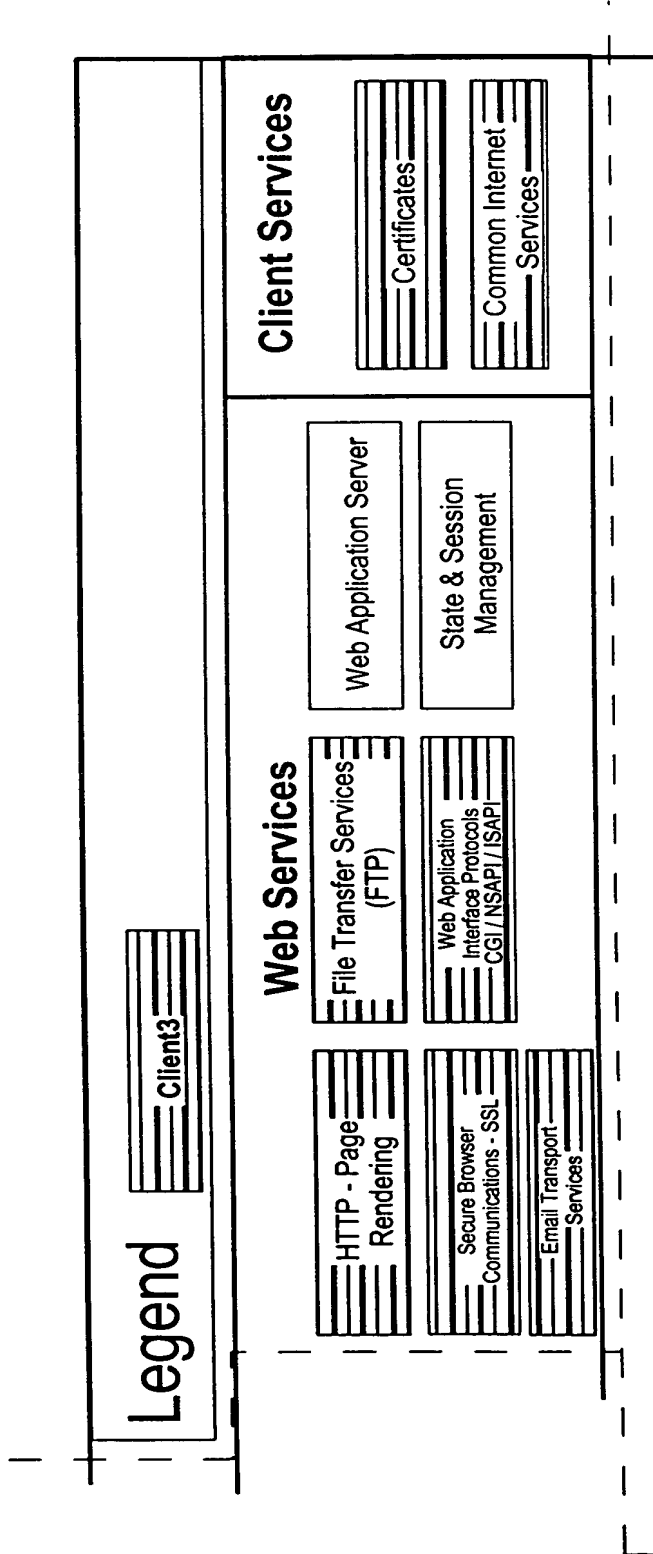


Fig. 32B

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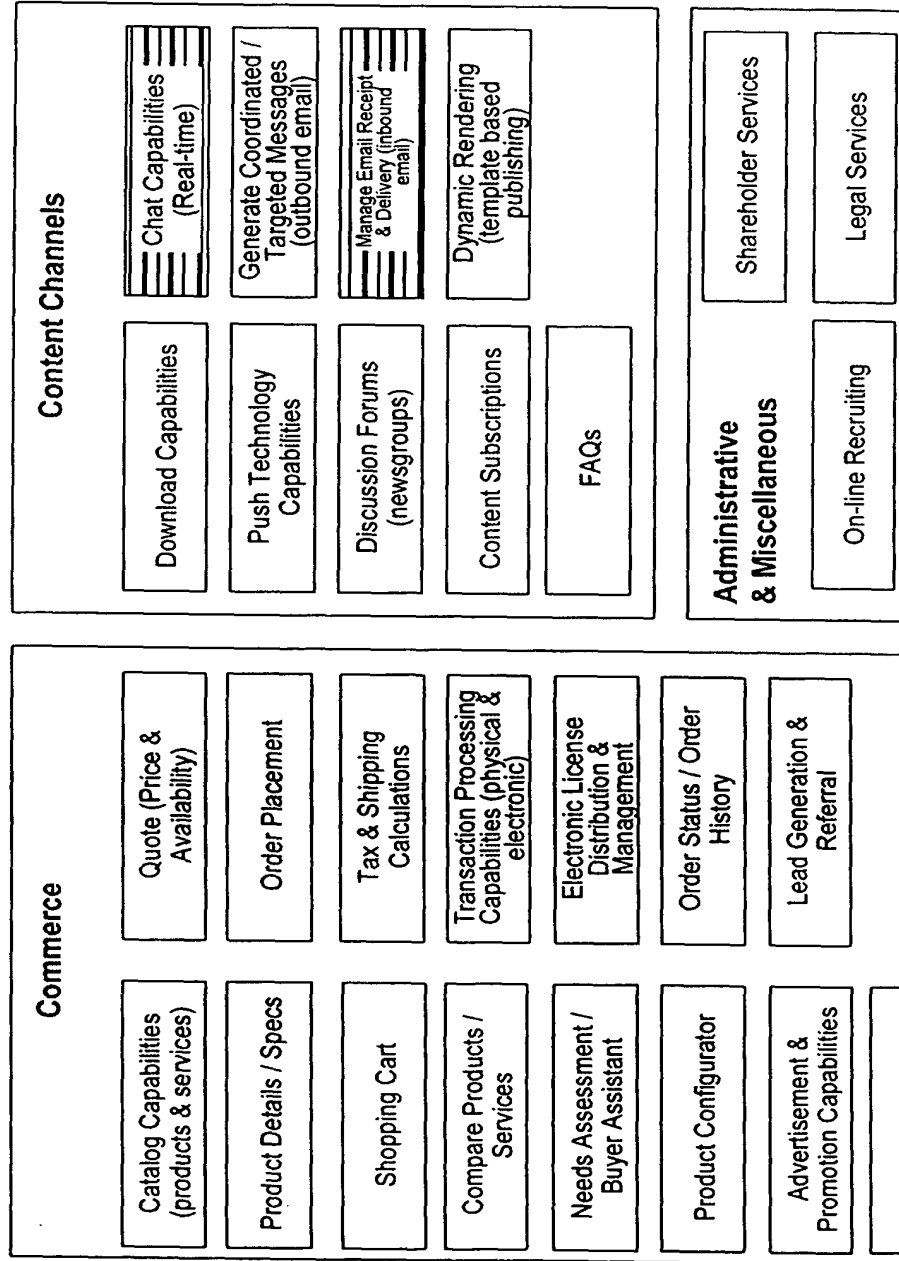


Fig. 32C

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Inventor: GUHEEN ET AL. Docket No.: 8567.111USC1
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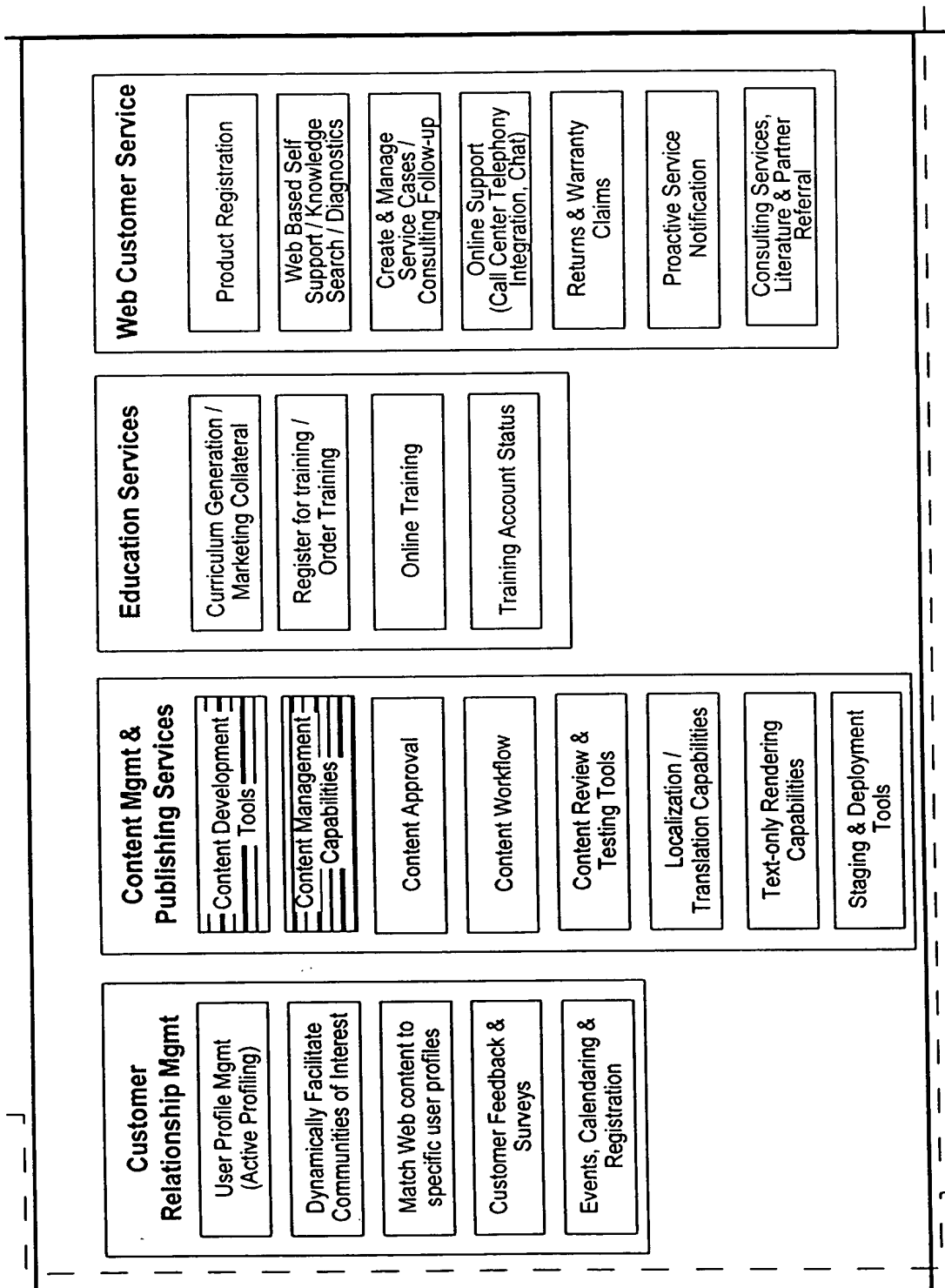


Fig. 32D

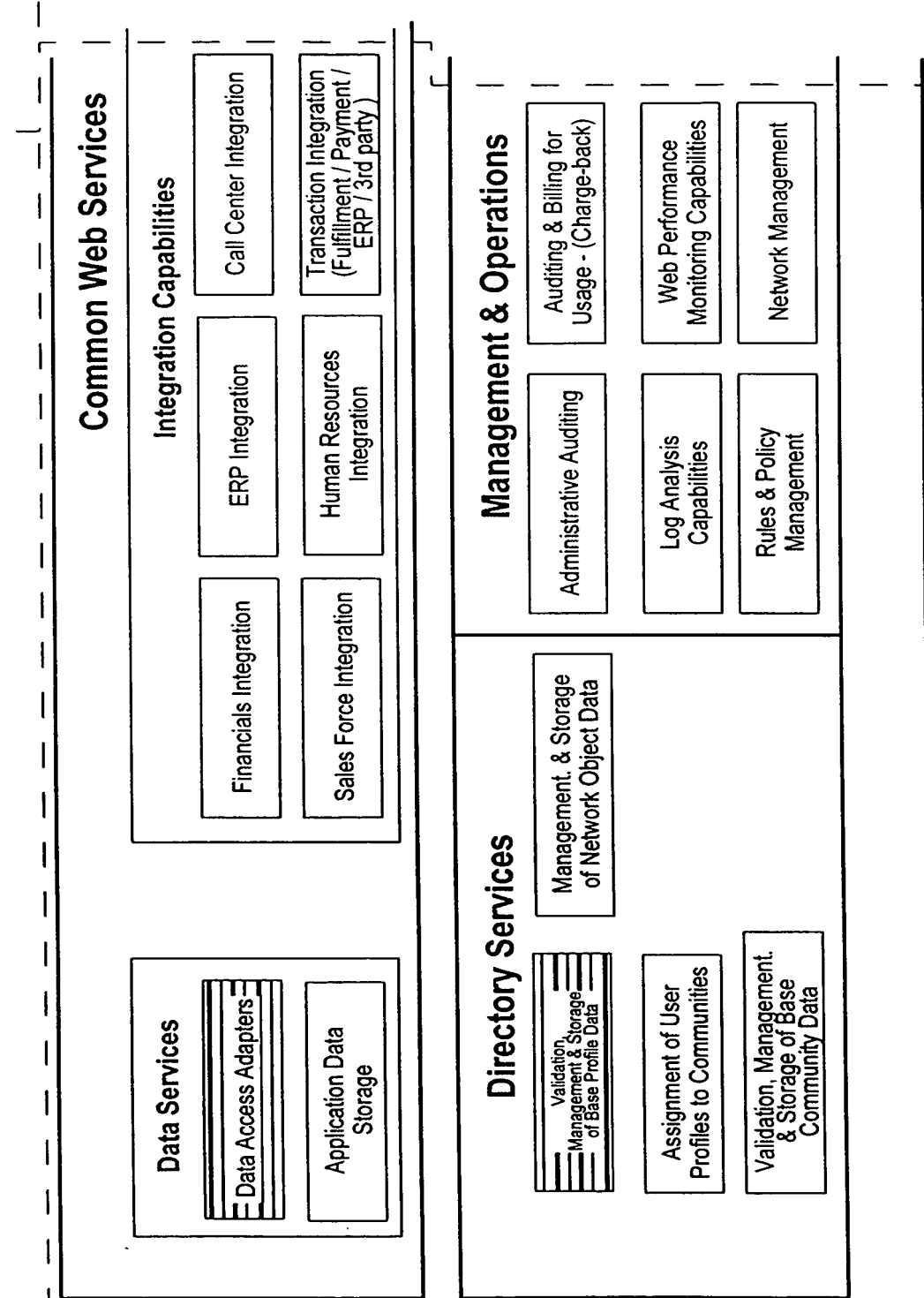


Fig. 32E

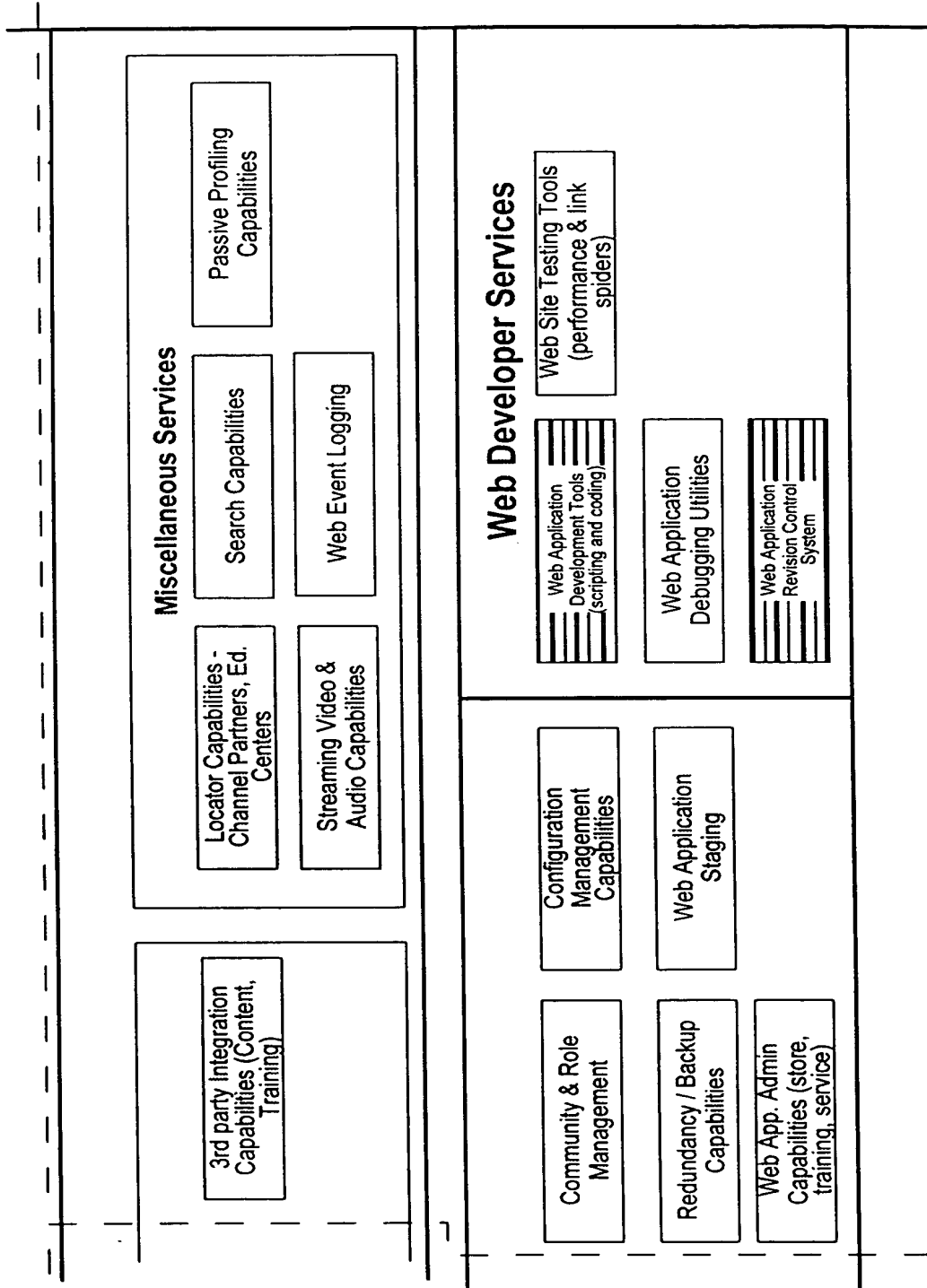


Fig. 32f

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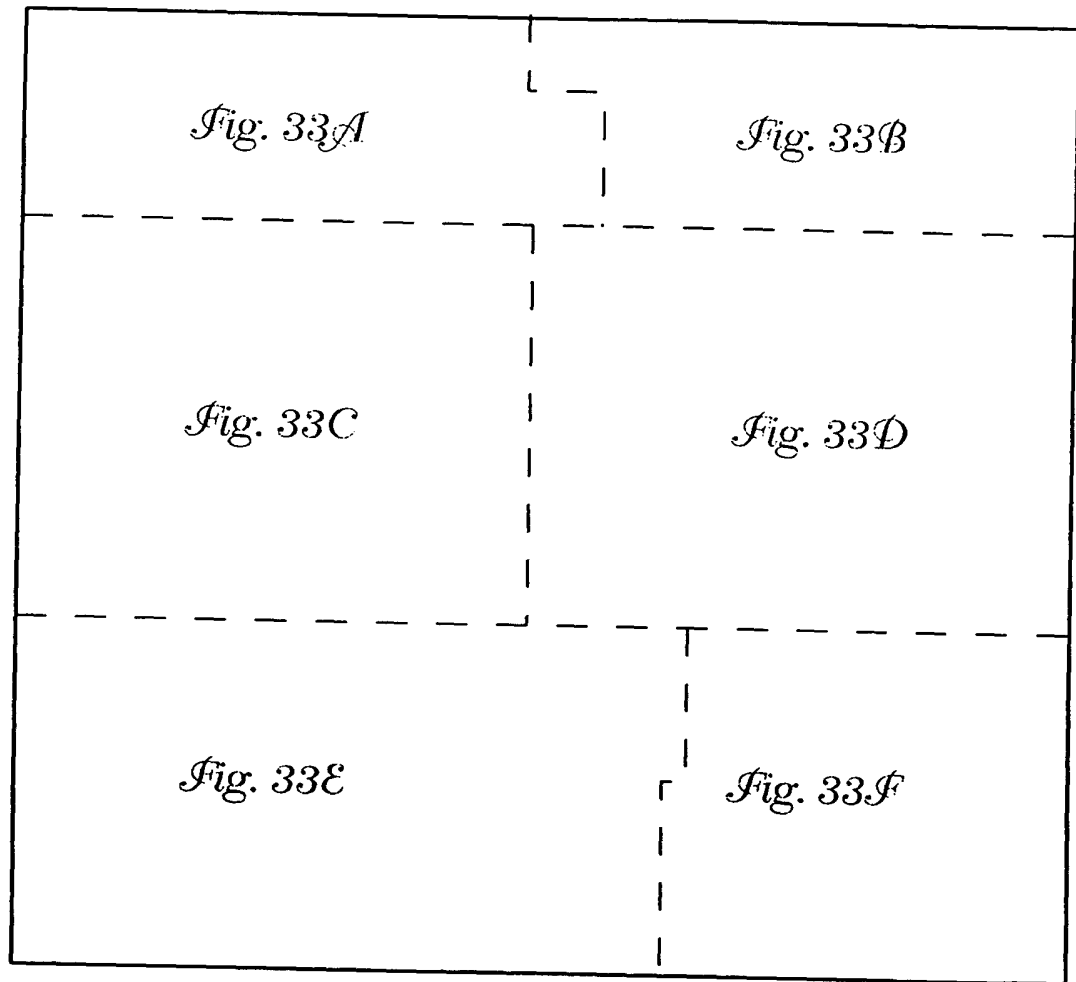


Fig. 33

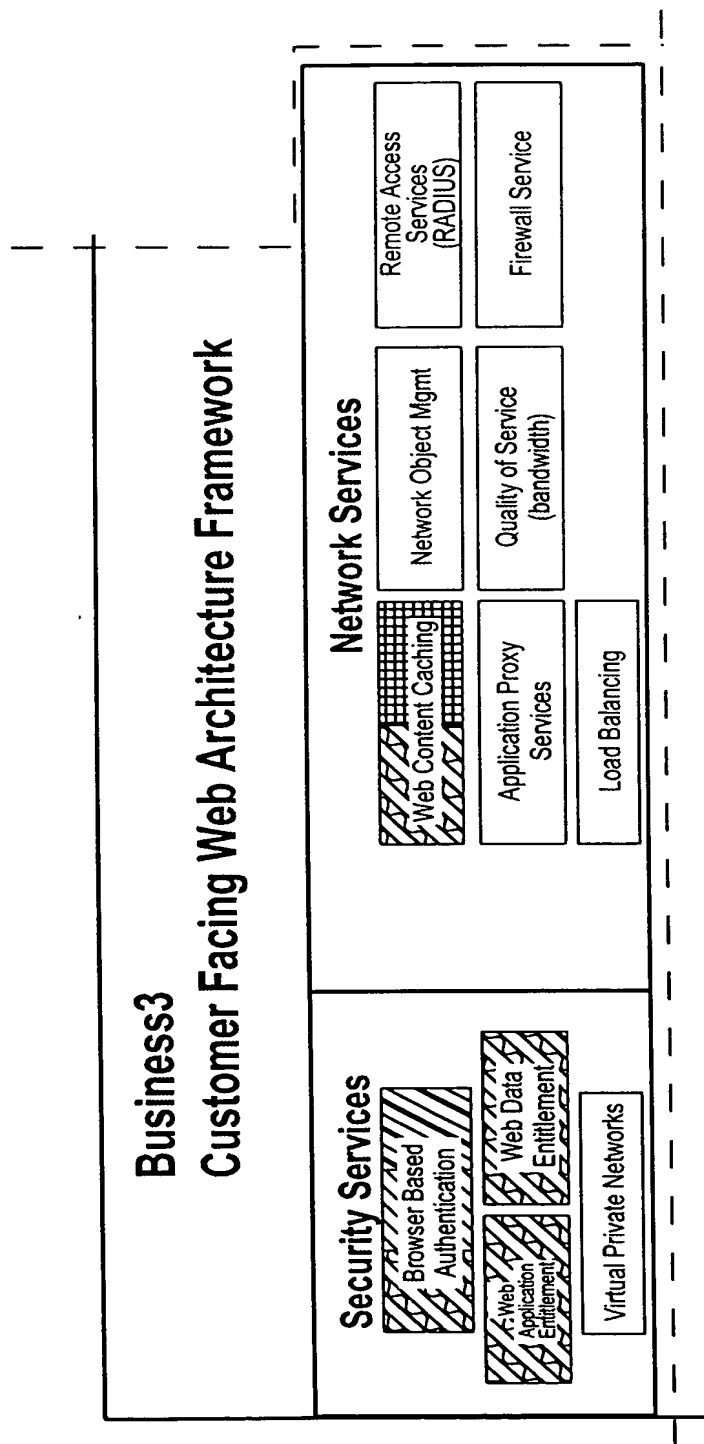


Fig. 33A

REPLACEMENT SHEET

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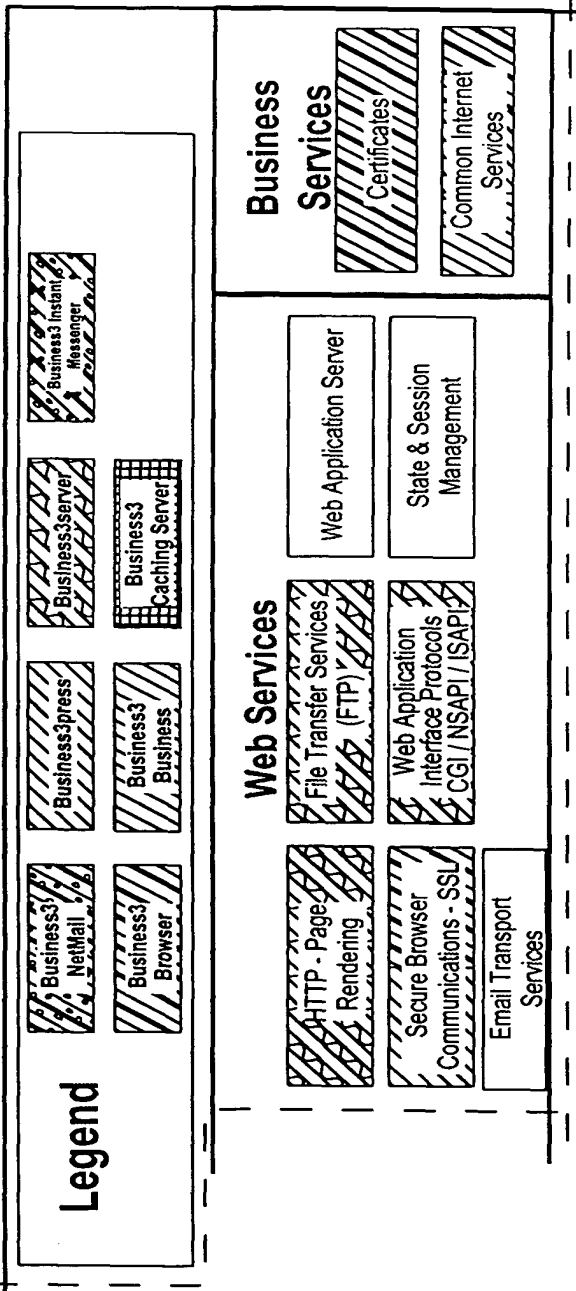
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Fig. 33B



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Web Application Services

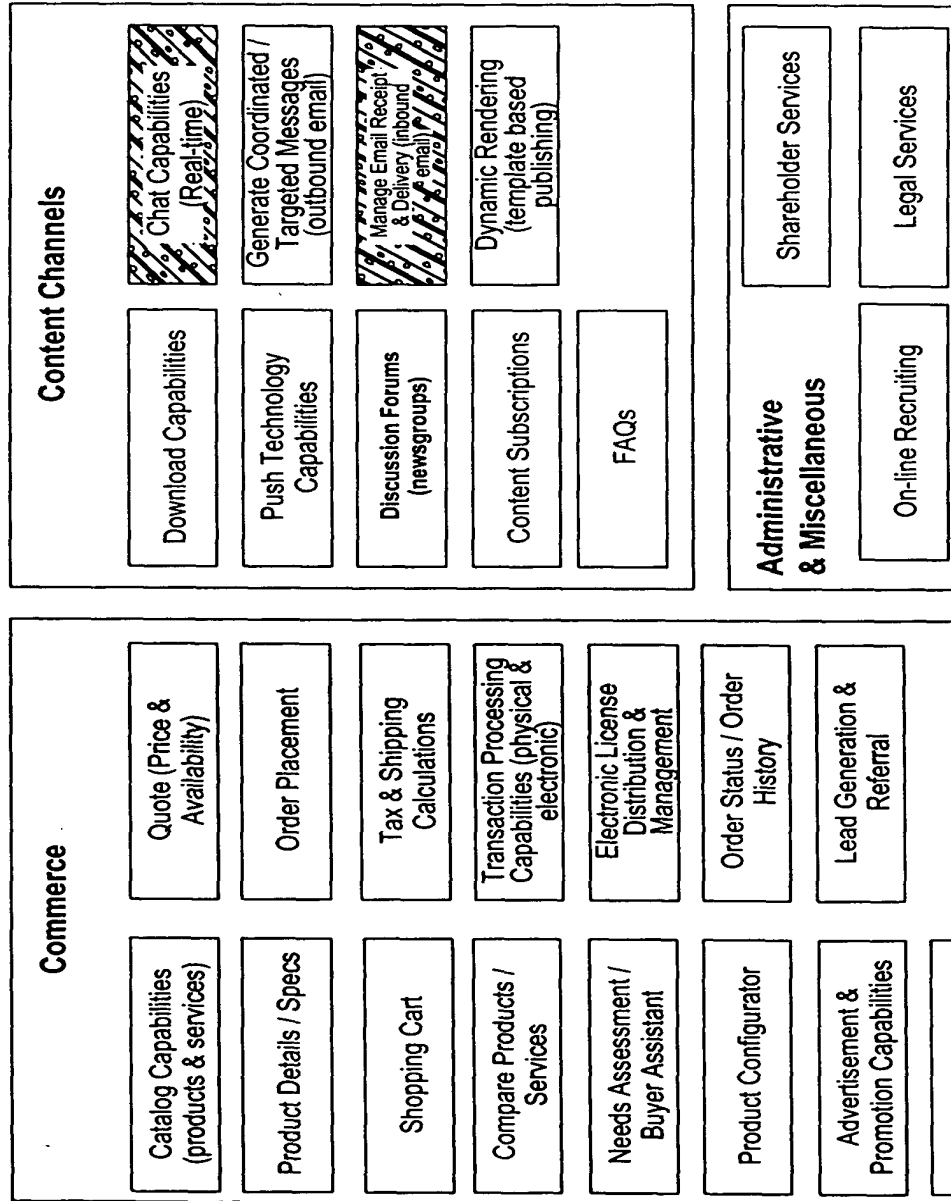


Fig. 33C

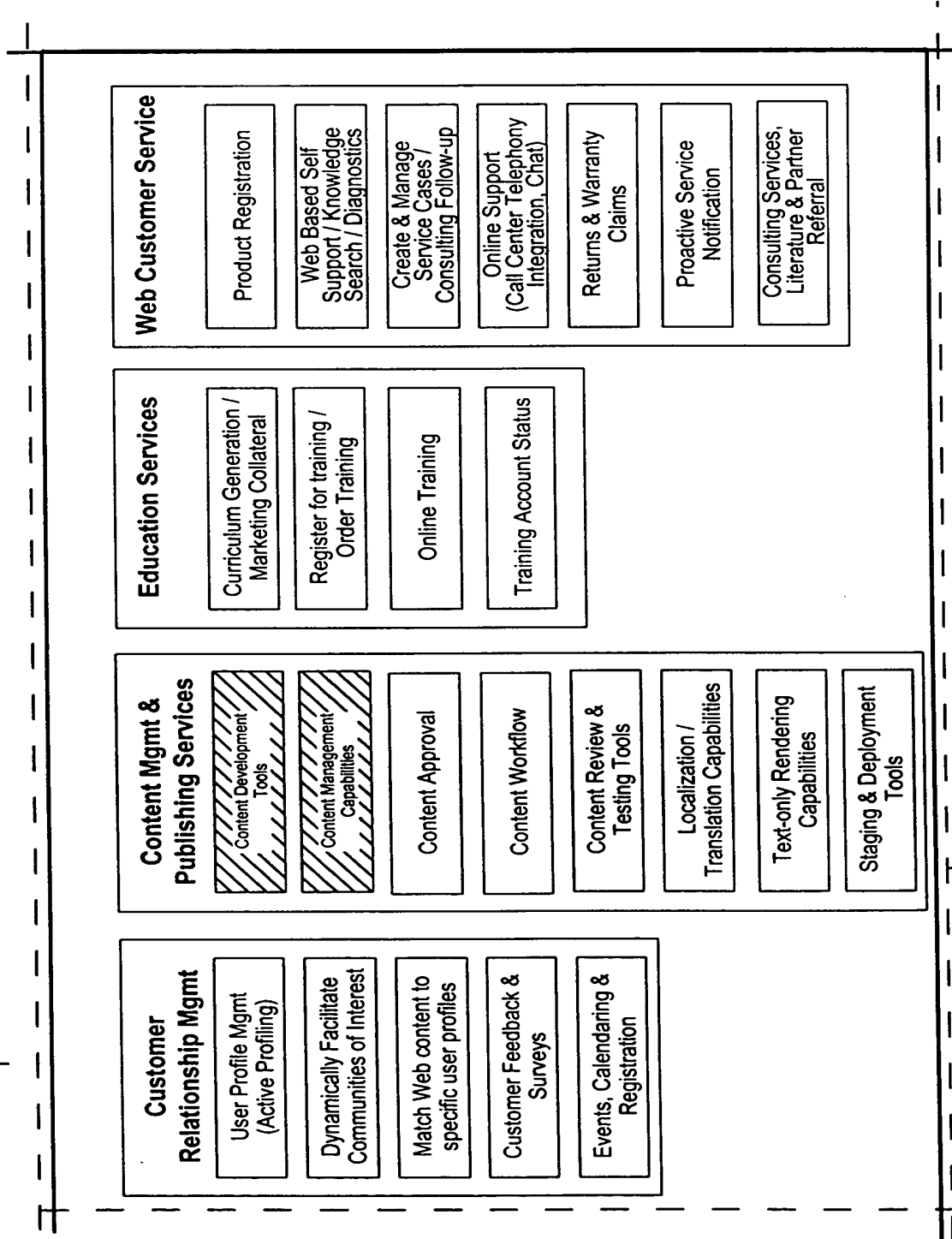


Fig. 33D

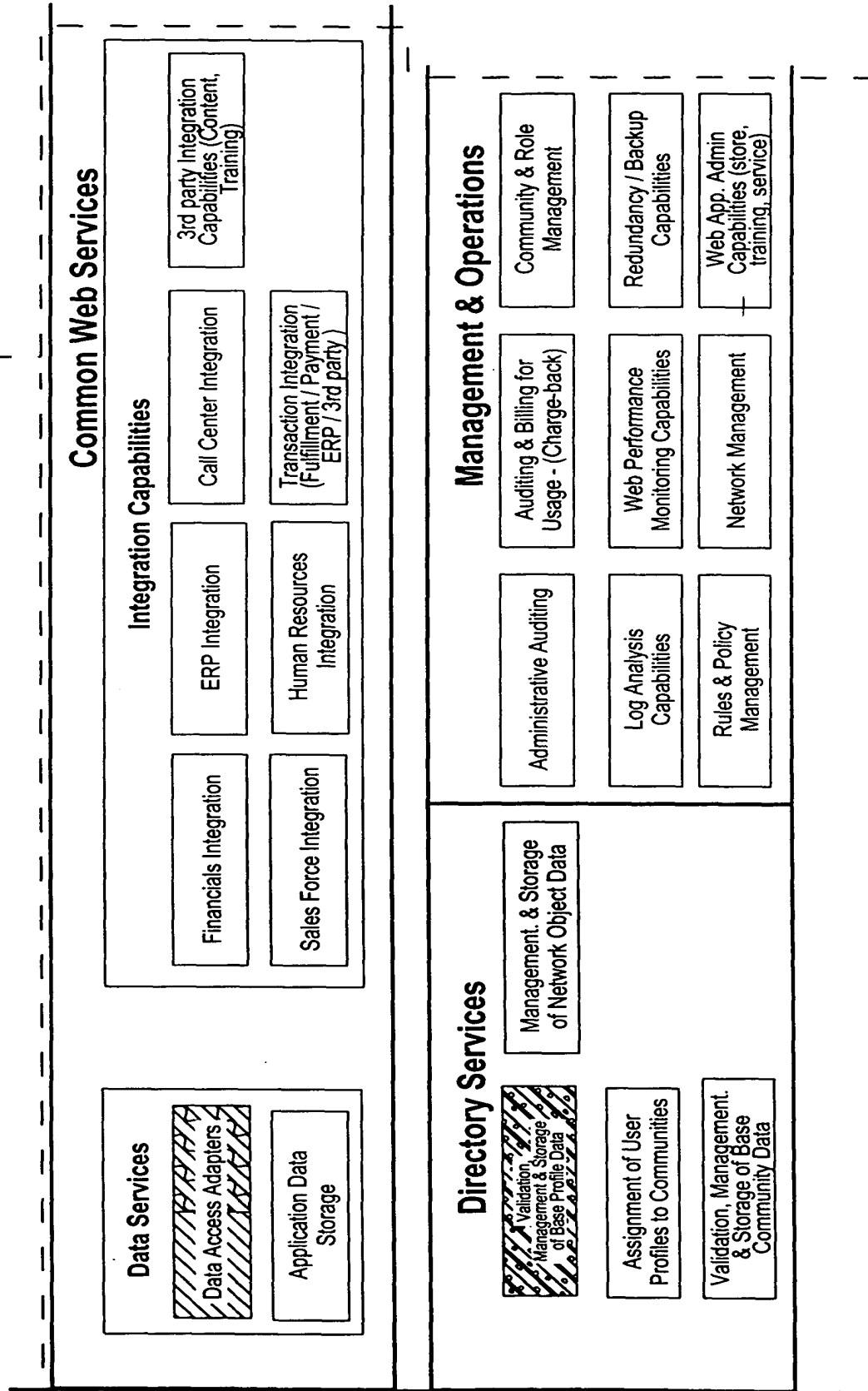


Fig. 33E

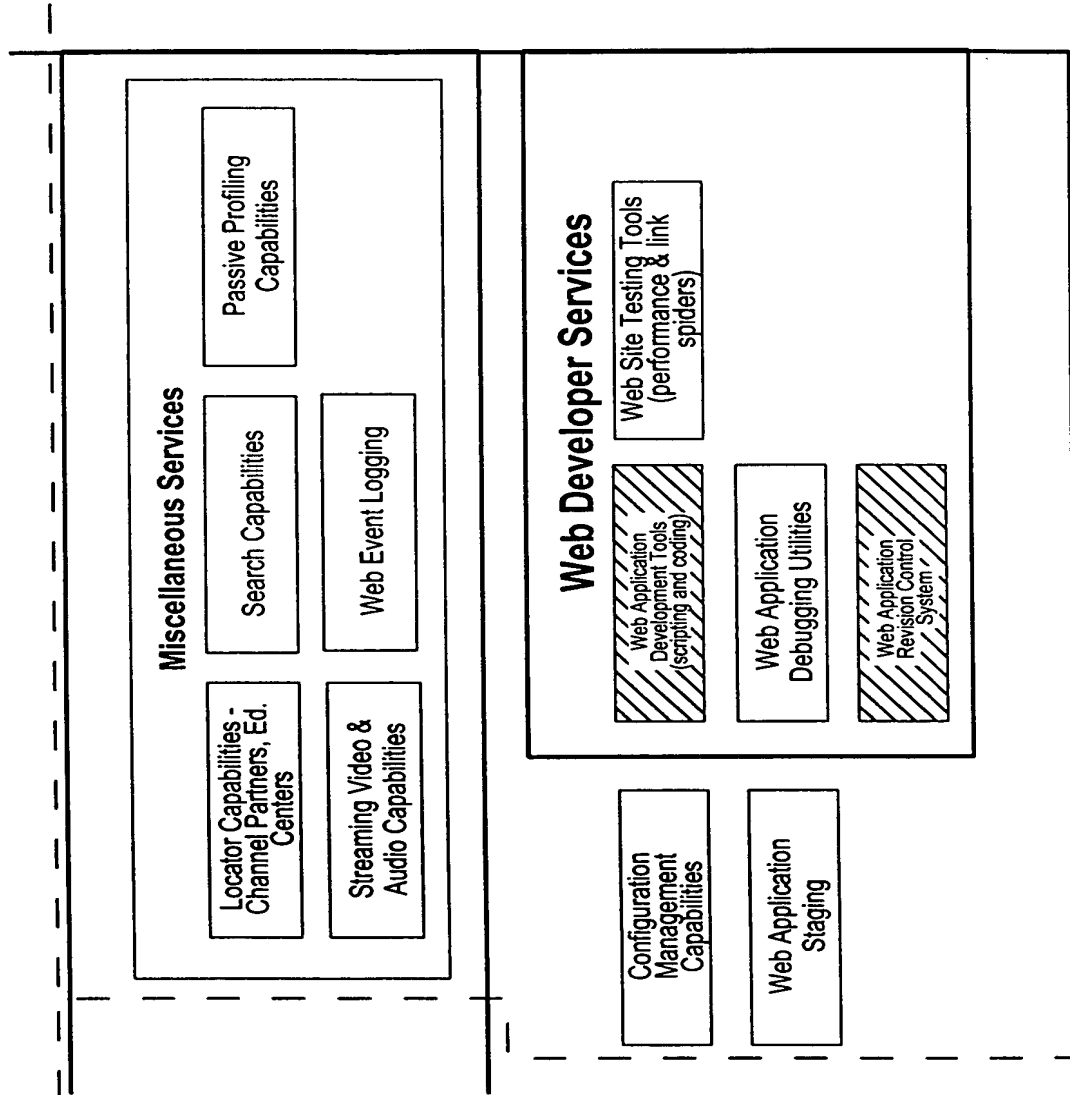


Fig. 33F

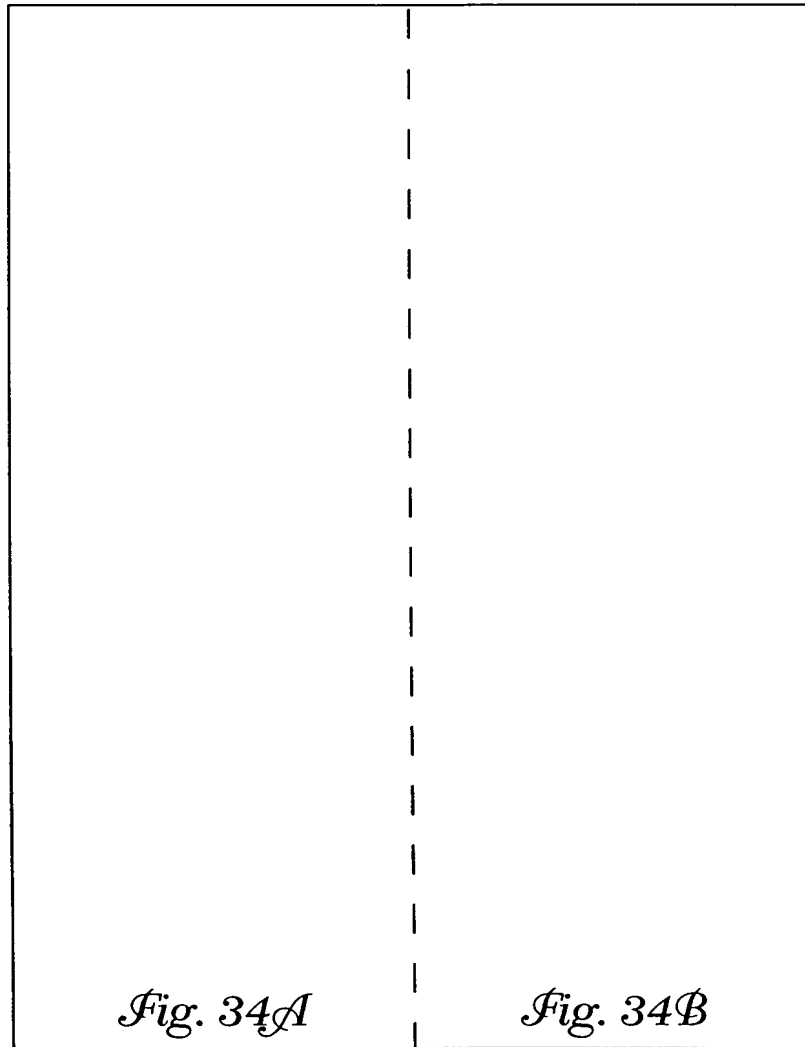


Fig. 34

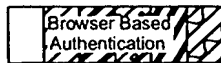
Business1

Customer Facing Capabilities - Infrastructure Services

Core Capabilities

Extended Detail

Security Services



- ☒ Verifies user identity using built-in browser functionality
- ☒ Maintains authentication information throughout sessions
- ☒ Utilizes centralized directory of profiles
- ☐ Provides LDAP compatibility
- ☐ Provides NDS compatibility



- ☐ ☒ ☒ Restricts access to specific web applications based upon user privileges
- ☐ ☒ ☒ Determines if a user or group of users have permission to perform an operation in a specific application
- ☐ ☒ ☒ Utilizes centralized directory of profiles for entitlement data
- ☐ ☒ ☒ Provides LDAP compatibility
- ☐ ☐ ☐ Provides NDS compatibility



- ☐ ☒ ☒ Restricts access to web content and data based upon user privileges
- ☐ ☒ ☒ Determines if a user or group of users have permission to manipulate web data (create, read, update, delete)
- ☐ ☒ ☒ Utilizes centralized directory of profiles for entitlement data
- ☐ ☒ ☒ Provides LDAP compatibility
- ☐ ☐ ☐ Provides NDS compatibility



- ☐ ☒ Offers guaranteed secure data transfer
- ☐ ☒ Allows remote login
- ☐ ☒ Provides ability to grant varying levels of access based on user identity

Network Services



- ☒ ☒ Stores frequently requested web pages and graphics in a temporary location
- ☒ ☒ Serves up previously cached content without accessing original source
- ☒ ☒ Updates cache automatically to ensure integrity of content

Fig. 34A

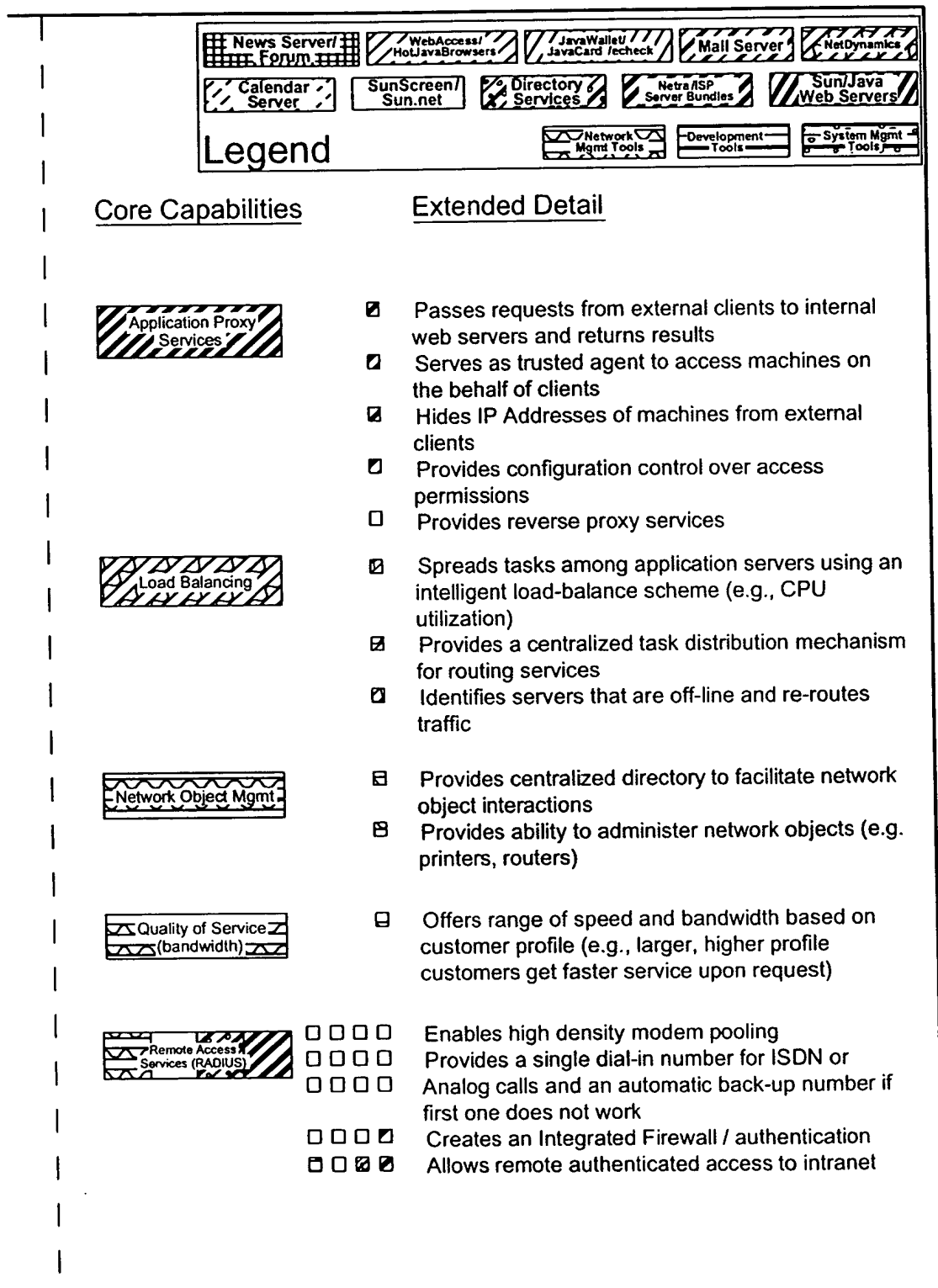
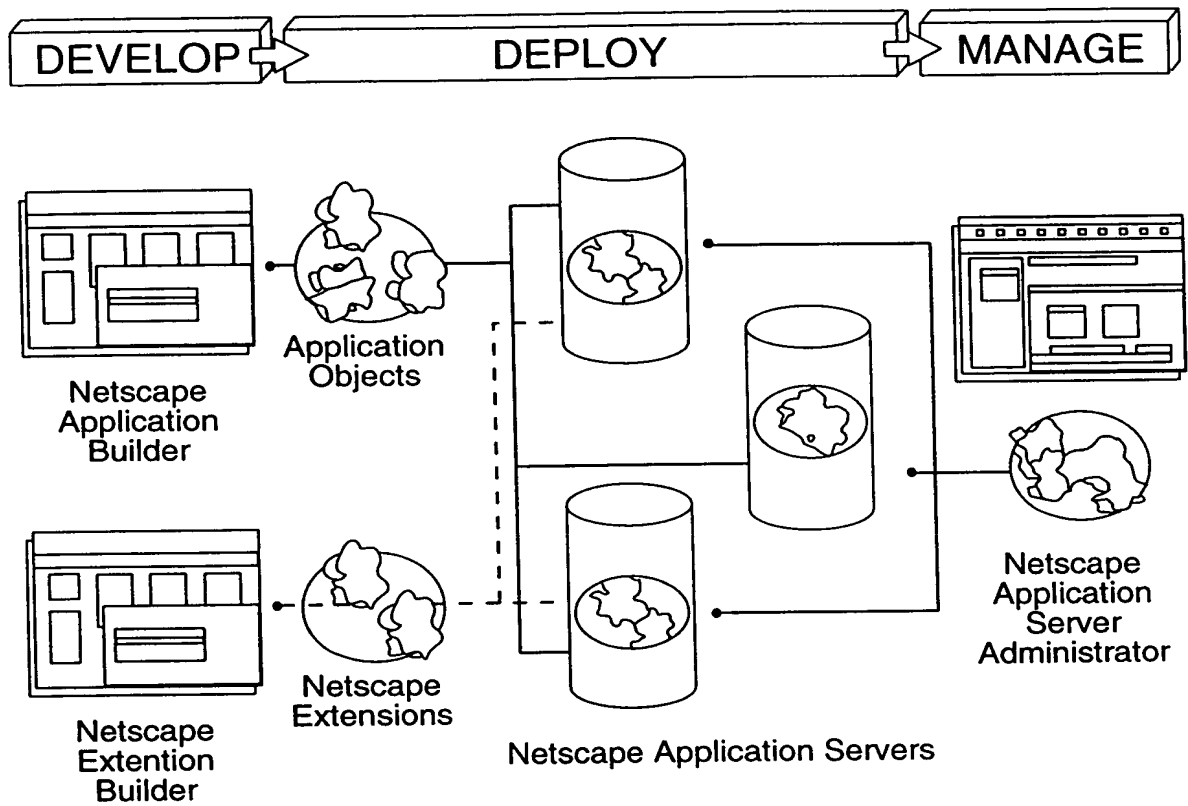


Fig. 34B

Client2 Application Server



Client2 Application Server

Fig. 35

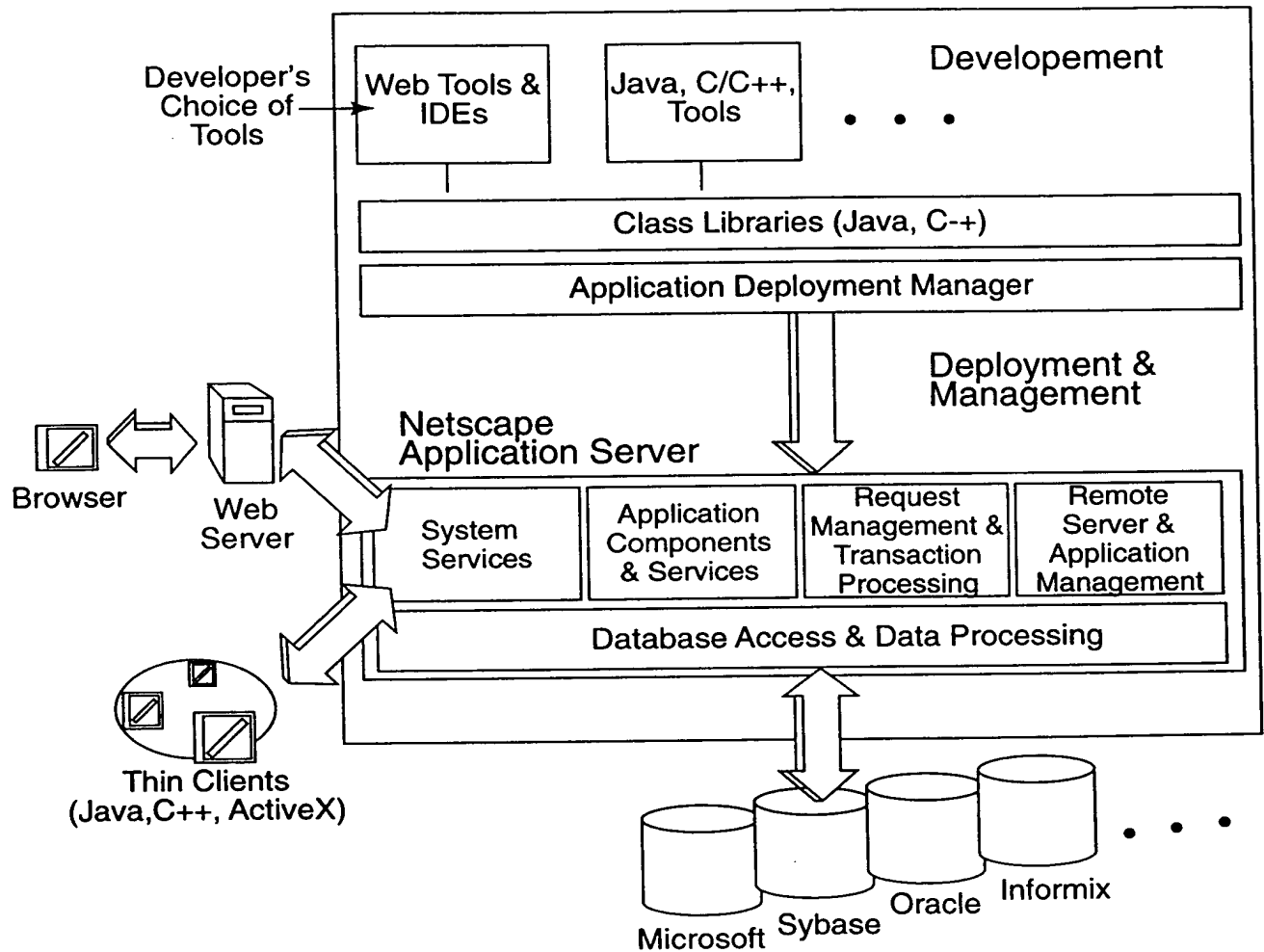


Fig. 36

Client2 ECXpert

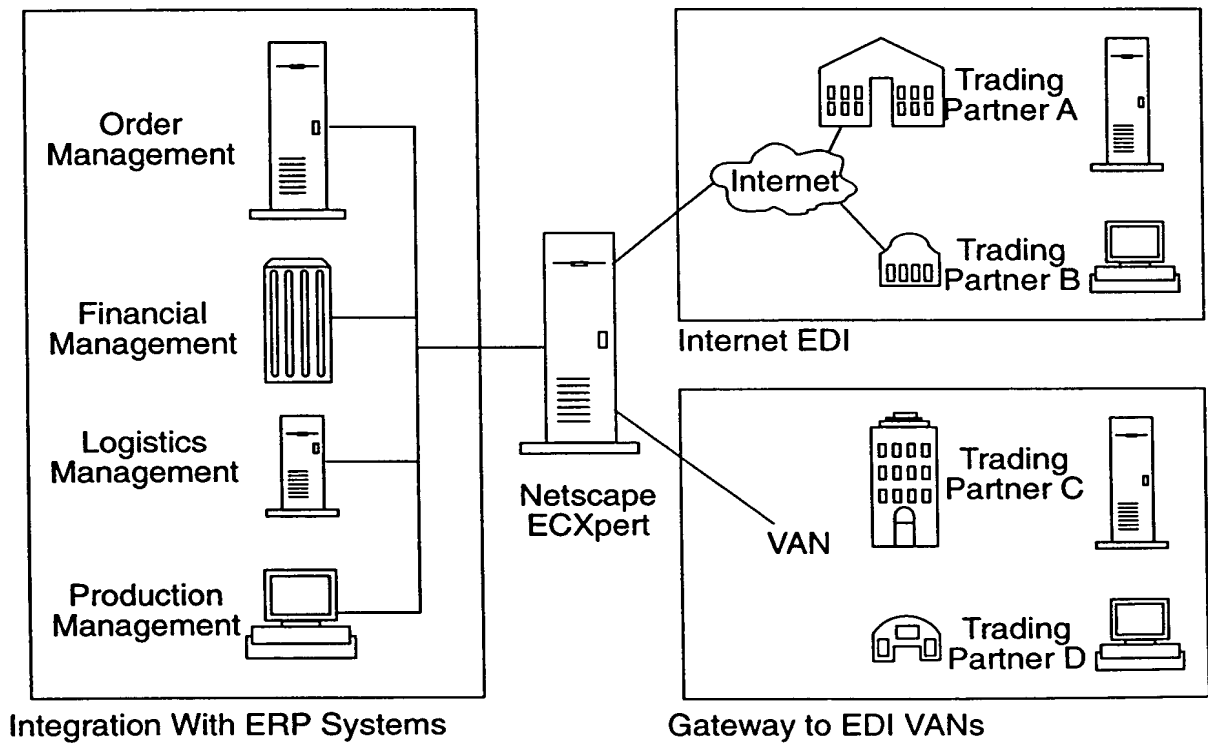


Fig. 37

Client2 ECXpert

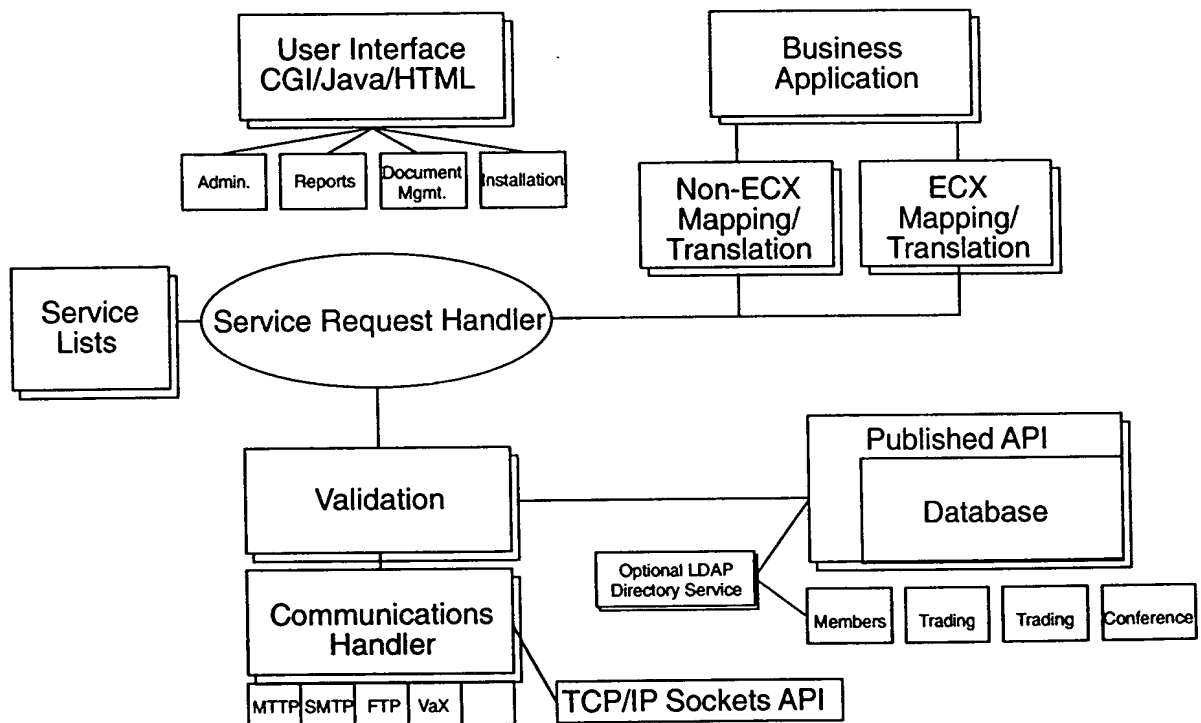


Fig. 38

Client2 SellerXpert

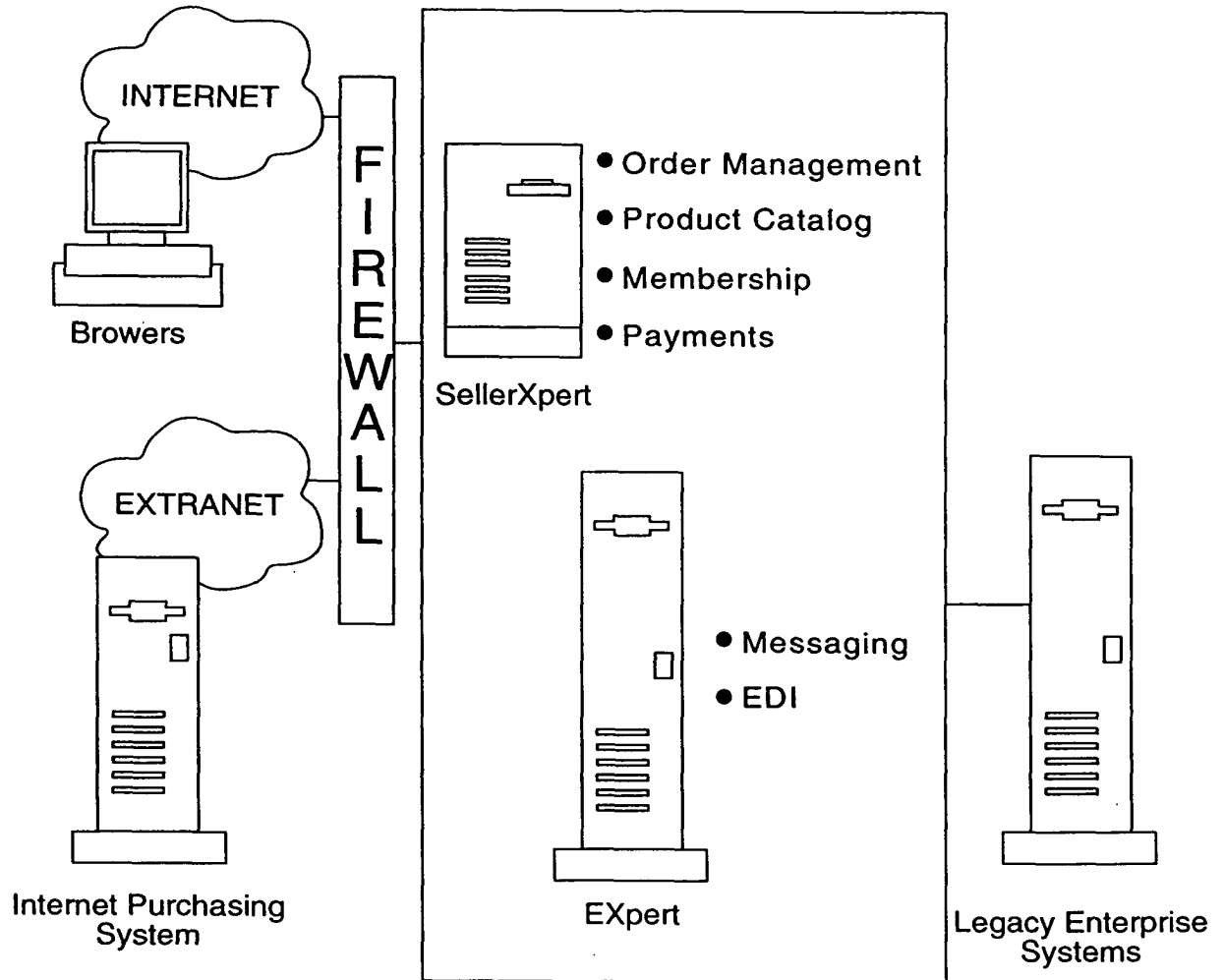


Fig. 39

Client2 PublishingXpert

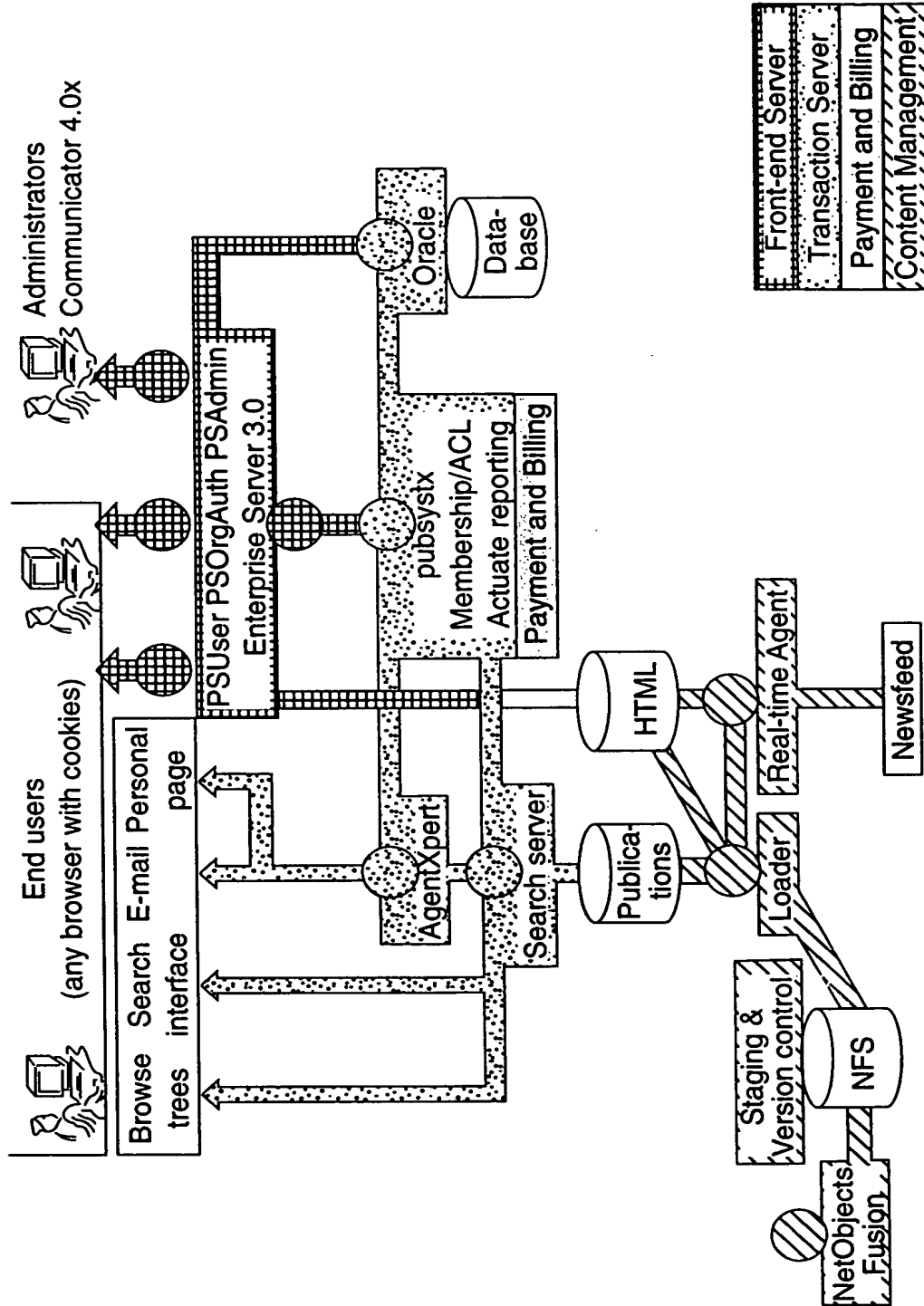
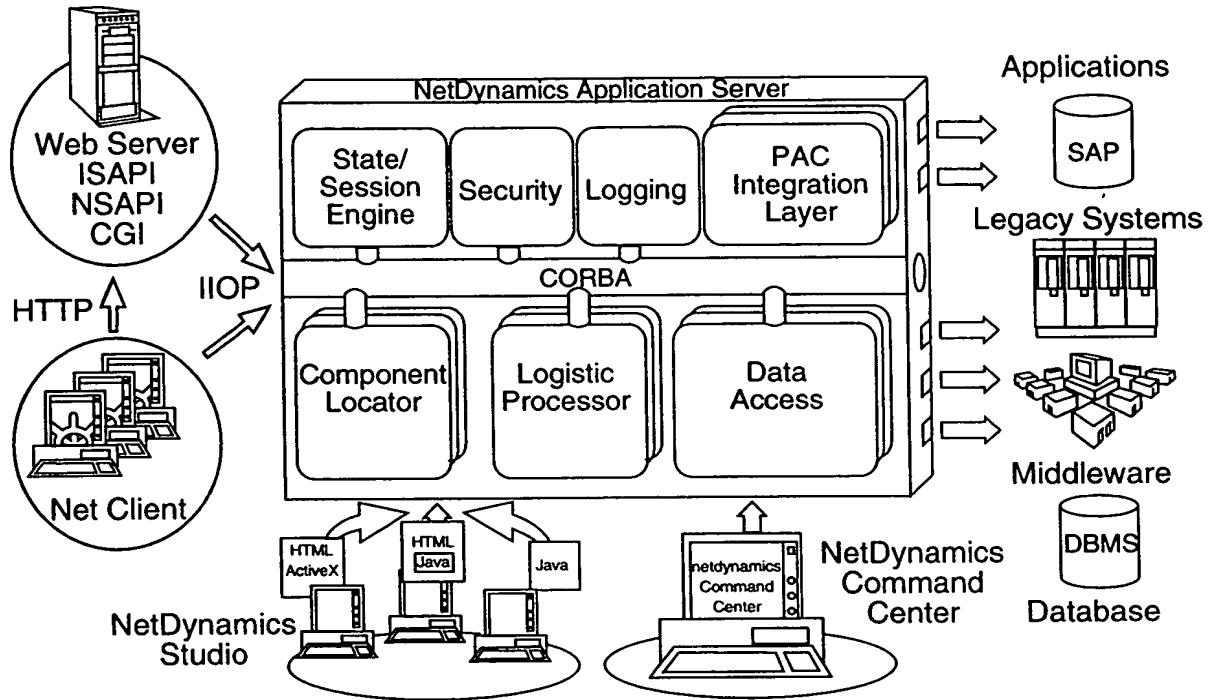


Fig. 40



- ① Any Web browser requests a dynamic-page
- ② The Web server notifies ColdFusion
- ③ ColdFusion processes the dynamic-page based on the CFML tags
- ④ ColdFusion generates an HTML page
- ⑤ The Web server sends the HTML page to the browser

Fig. 41

Client1 Internet Mail Server

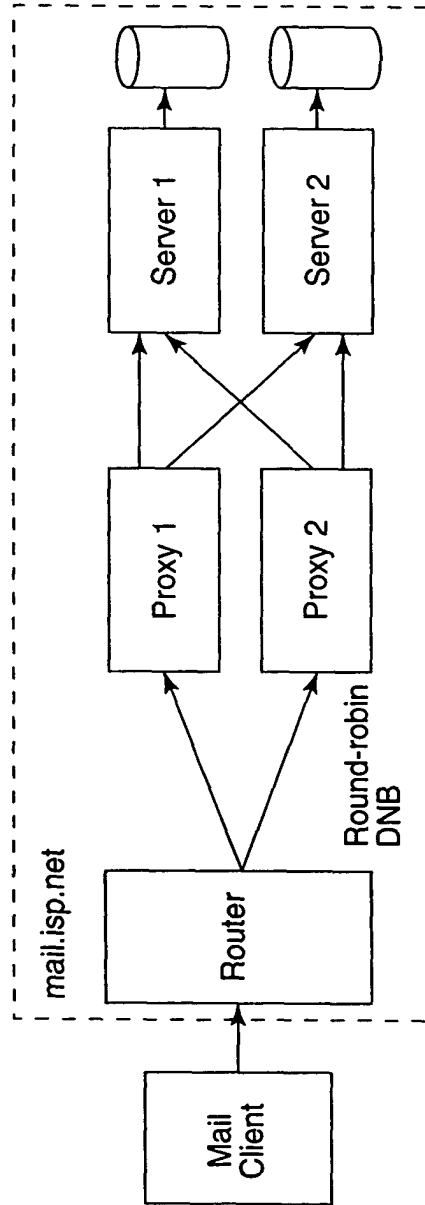


Fig. 42

Client1 Internet News Server

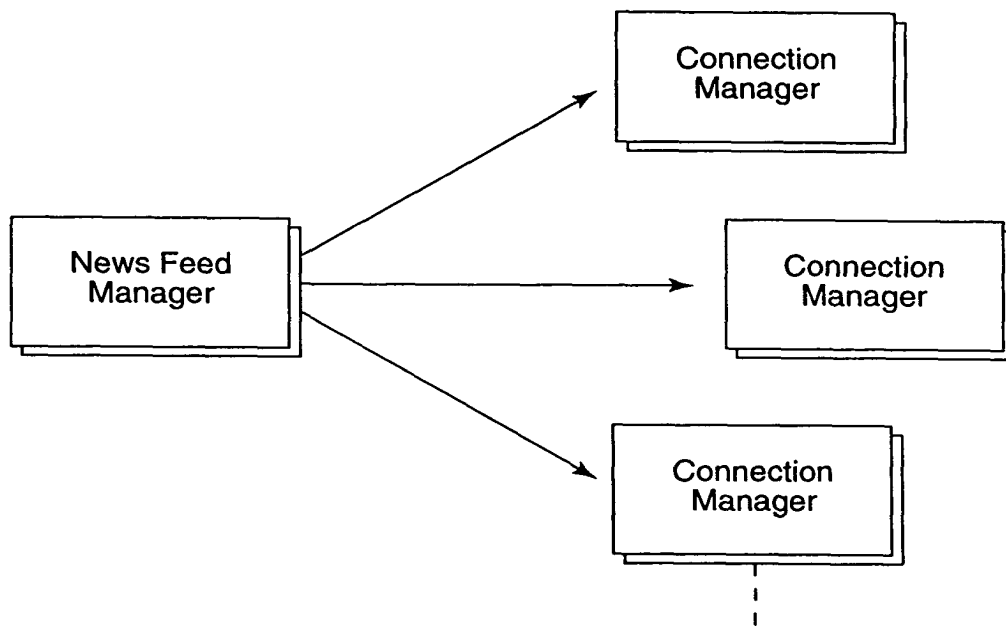


Fig. 43

Client1 Personal WebAccess Browser

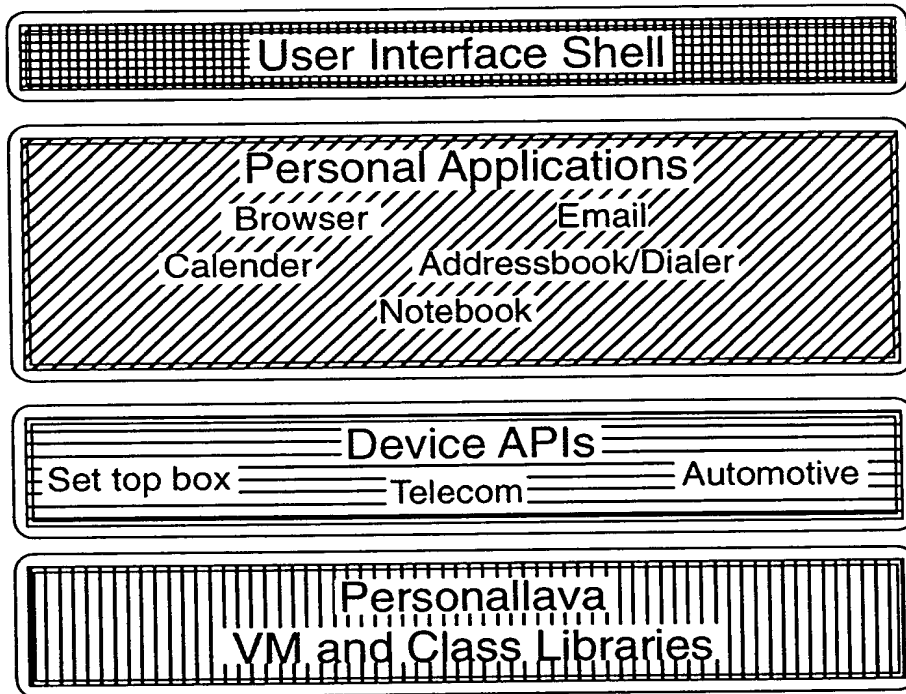


Fig. 44

Client1 Directory Services

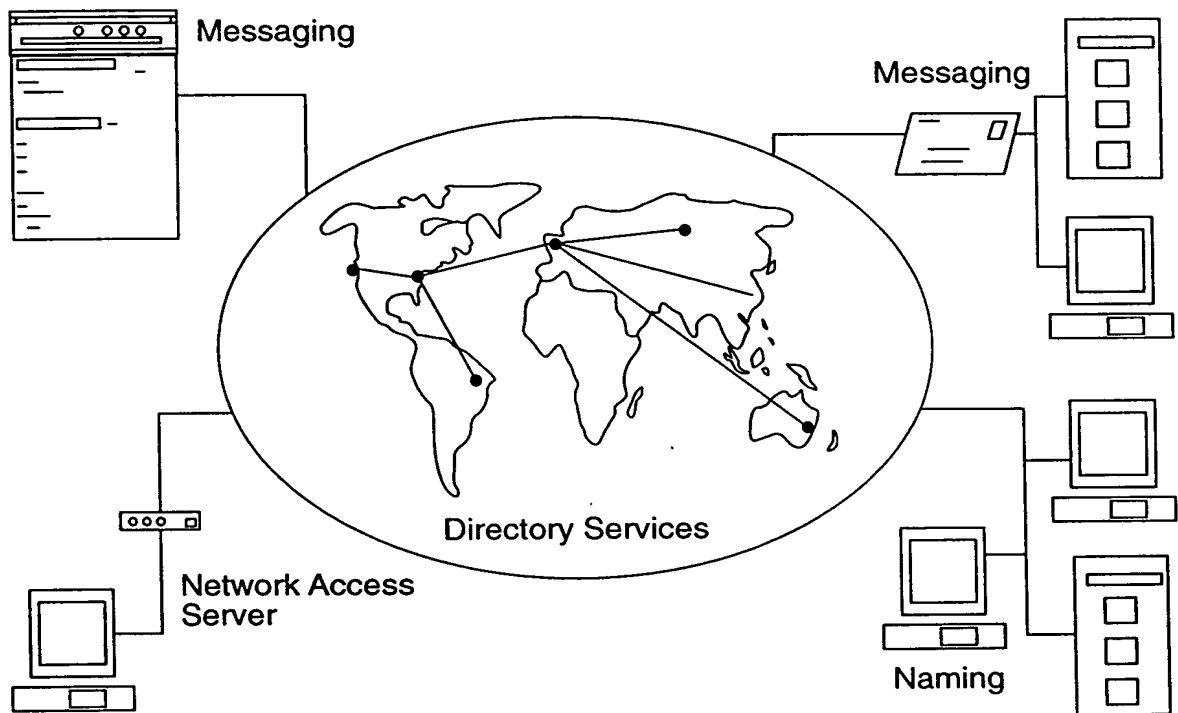


Fig. 45

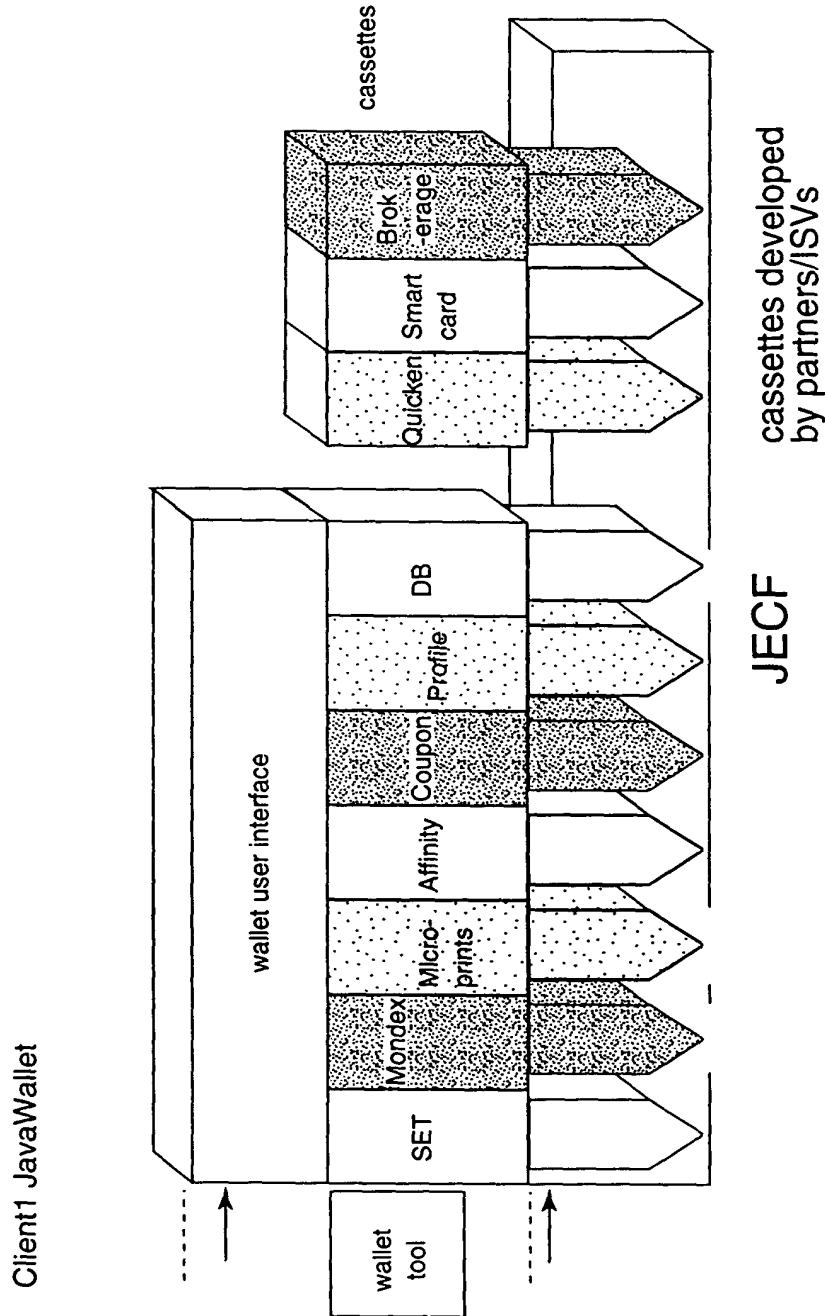


Fig. 46

Client1Screen Product Suite

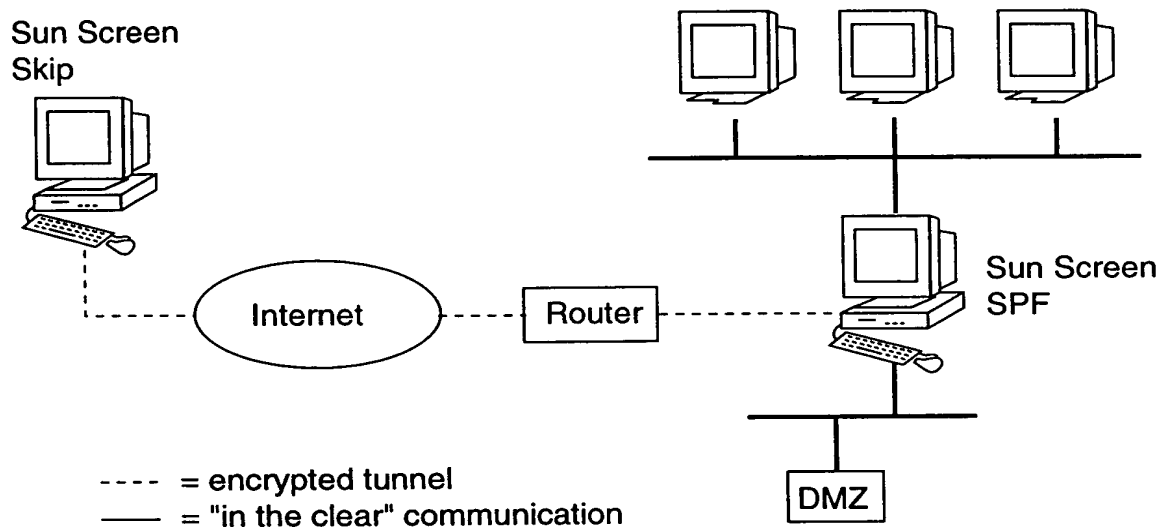


Fig. 47

Netra Internet Server Bundle

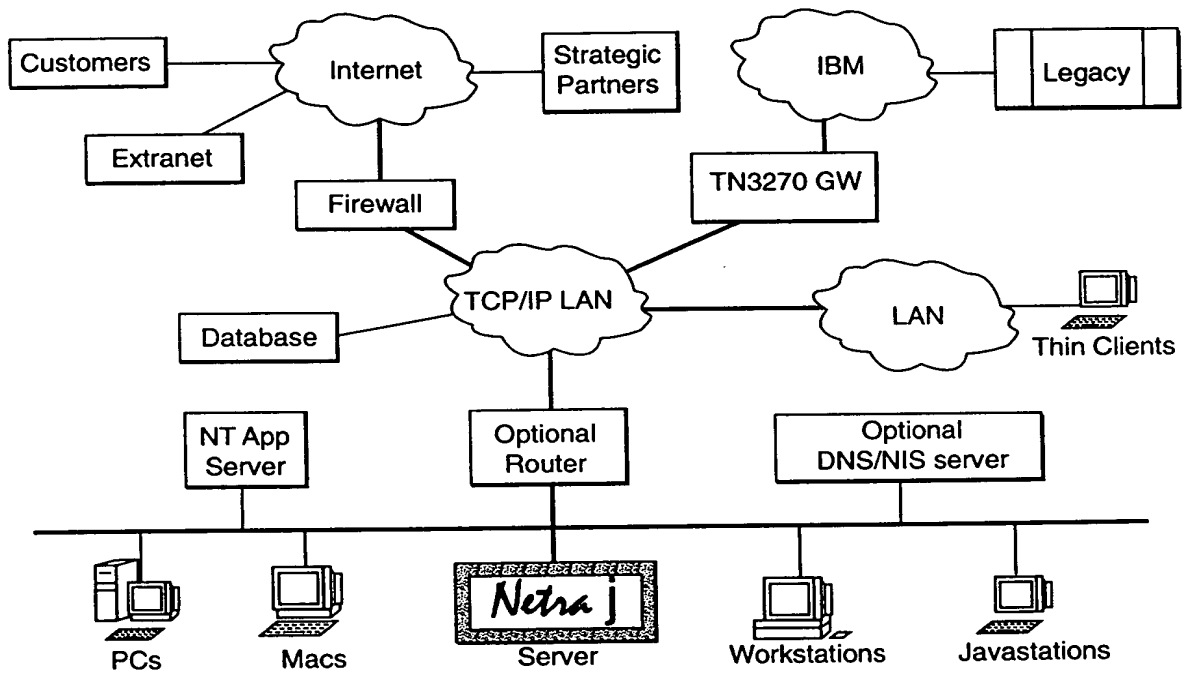


Fig. 48

Solaris ISP Server Bundle

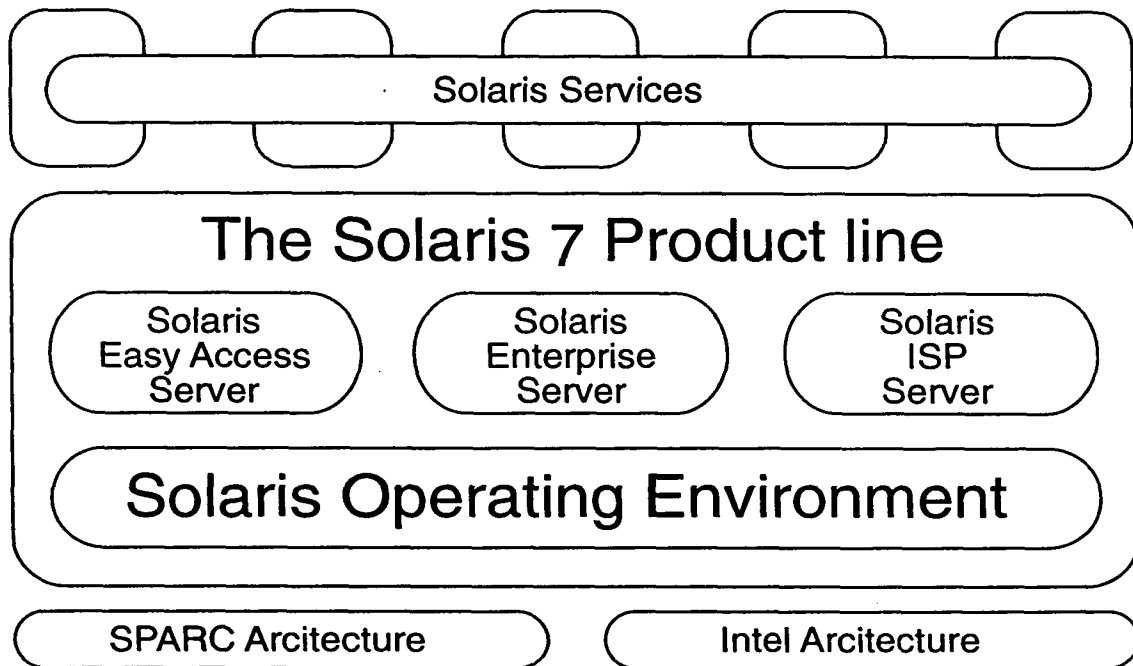


Fig. 49

Development & Testing Tools

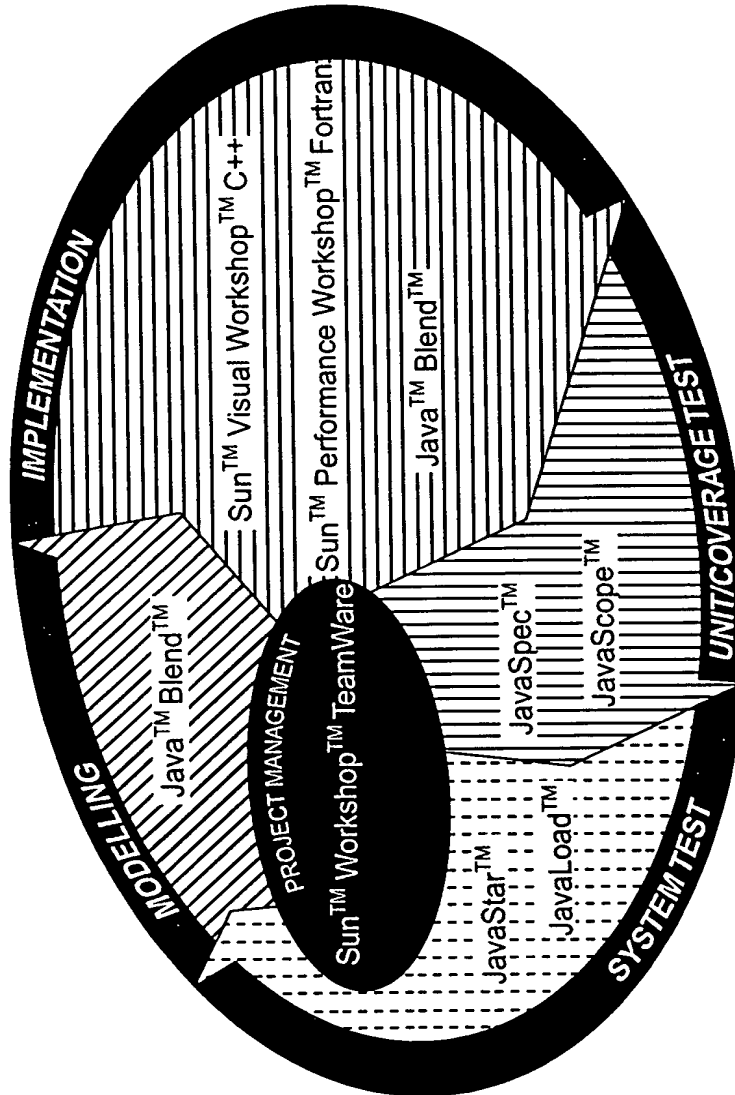


Fig. 50

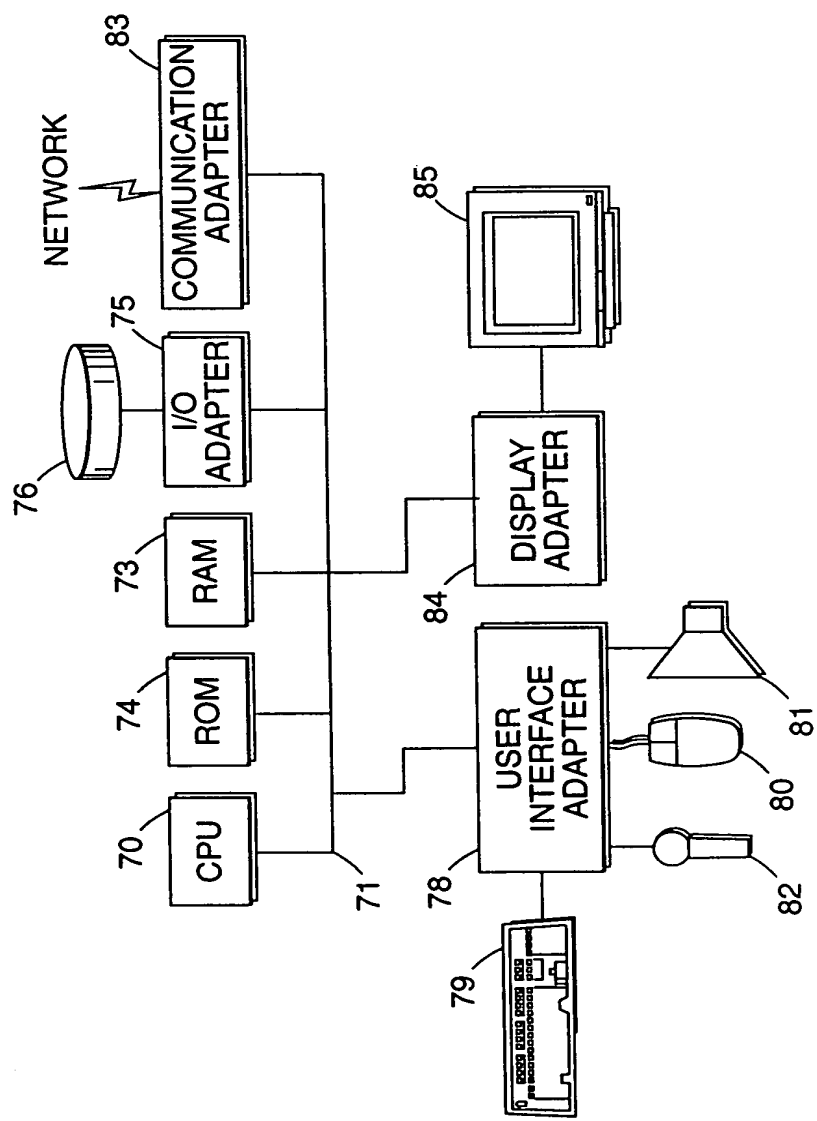


Fig. 51

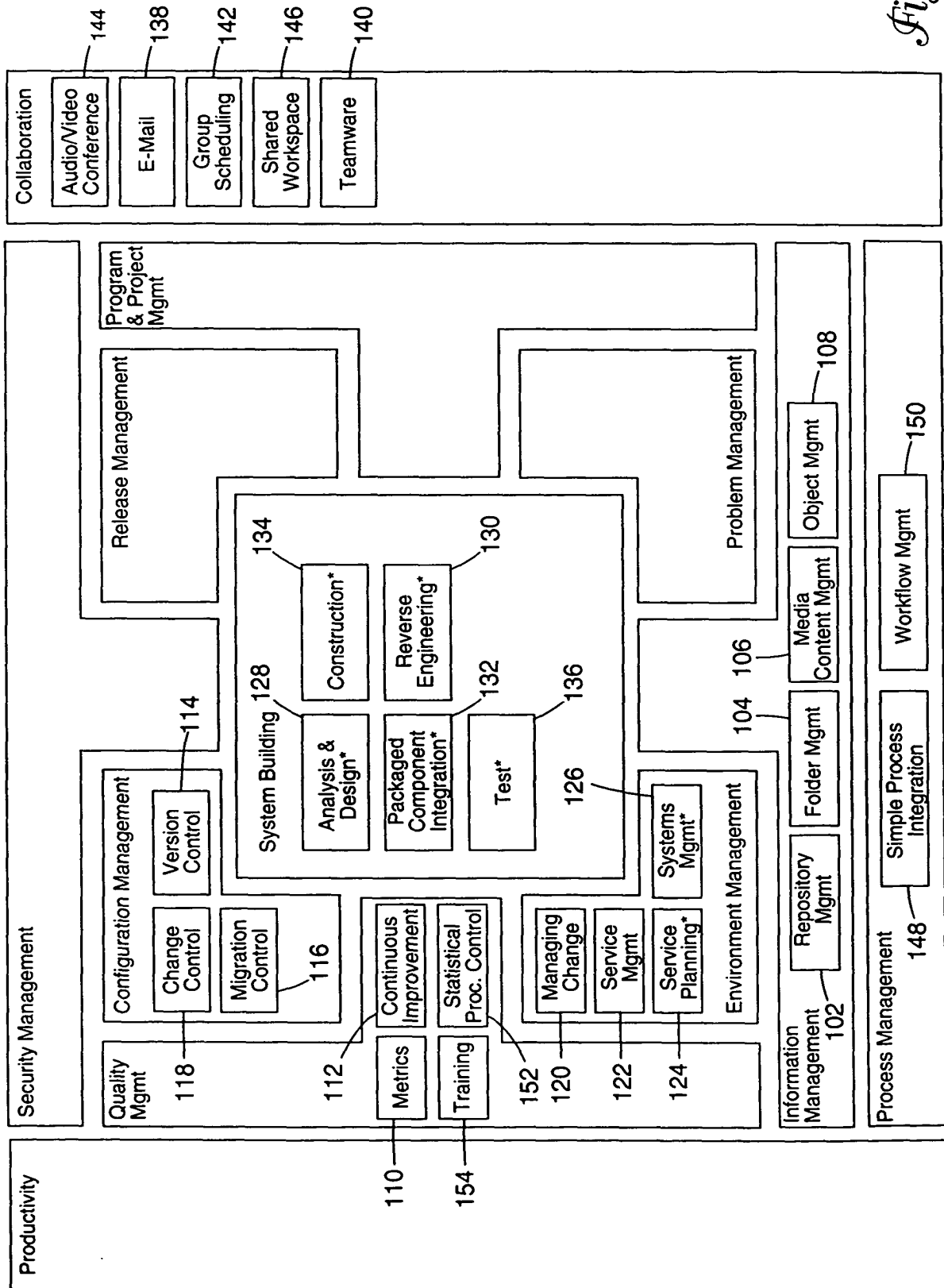


Fig. 52

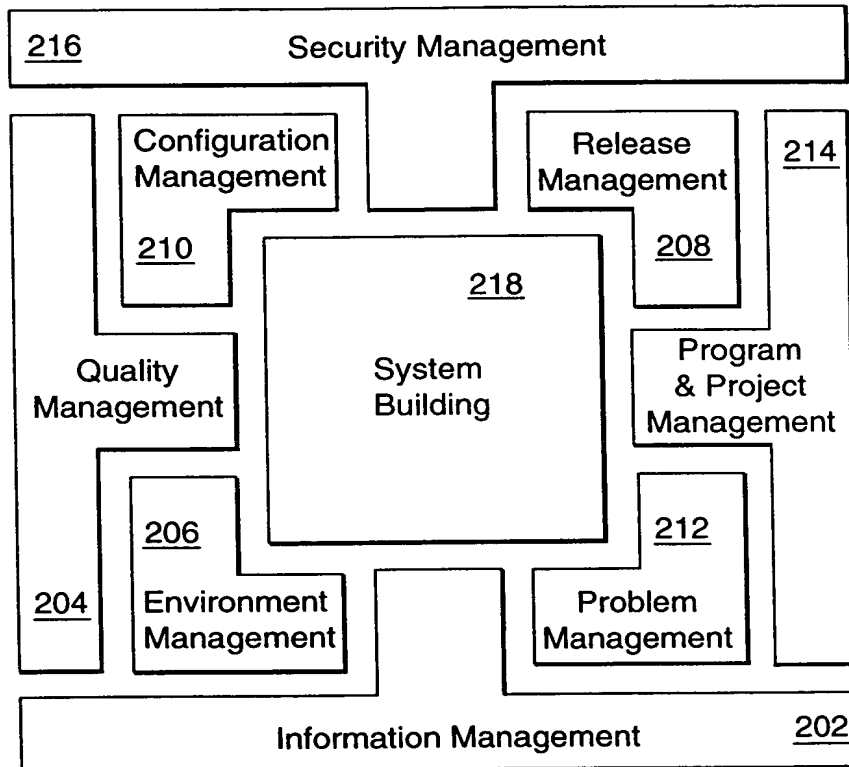


Fig. 53

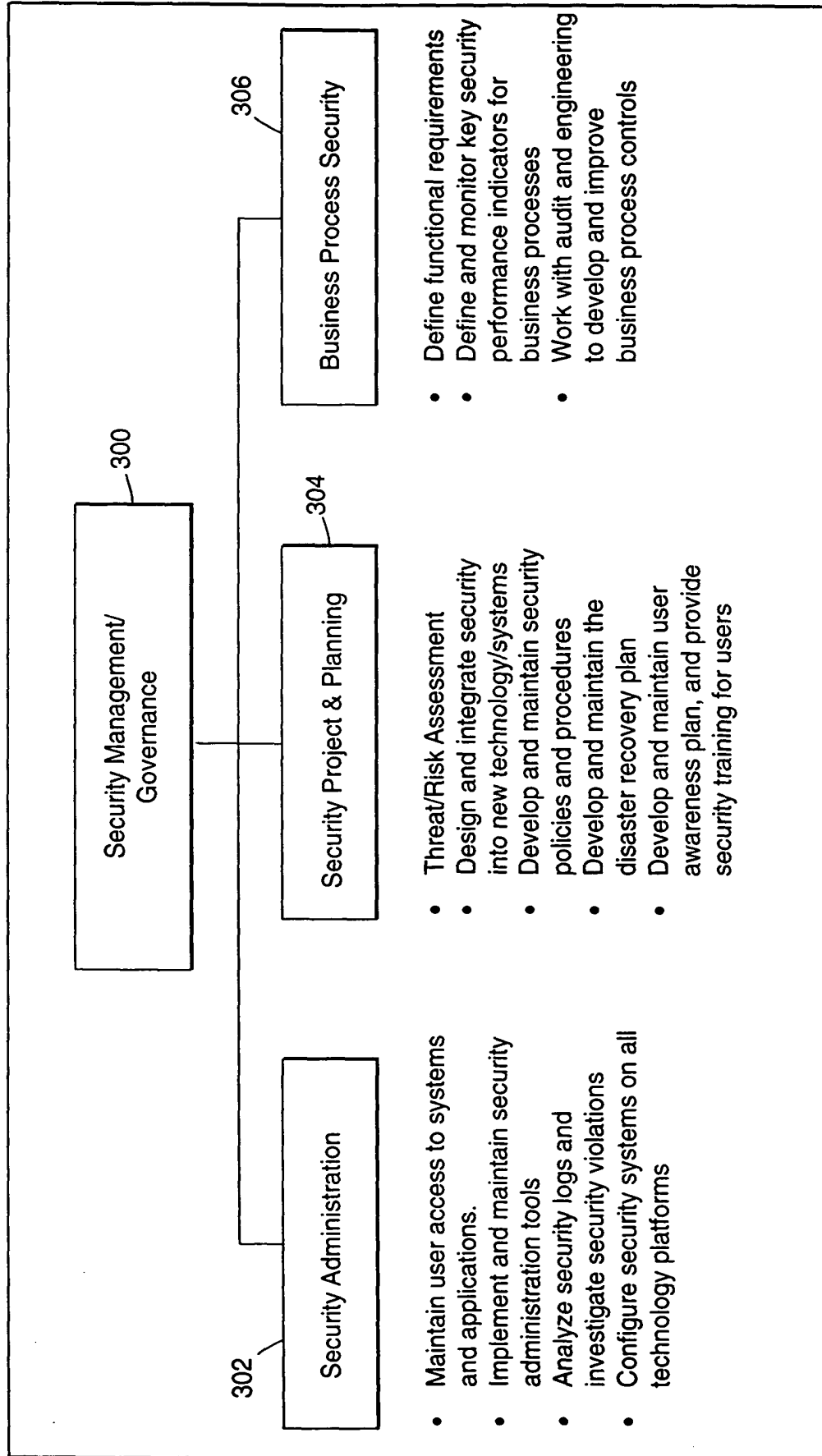


Fig. 54

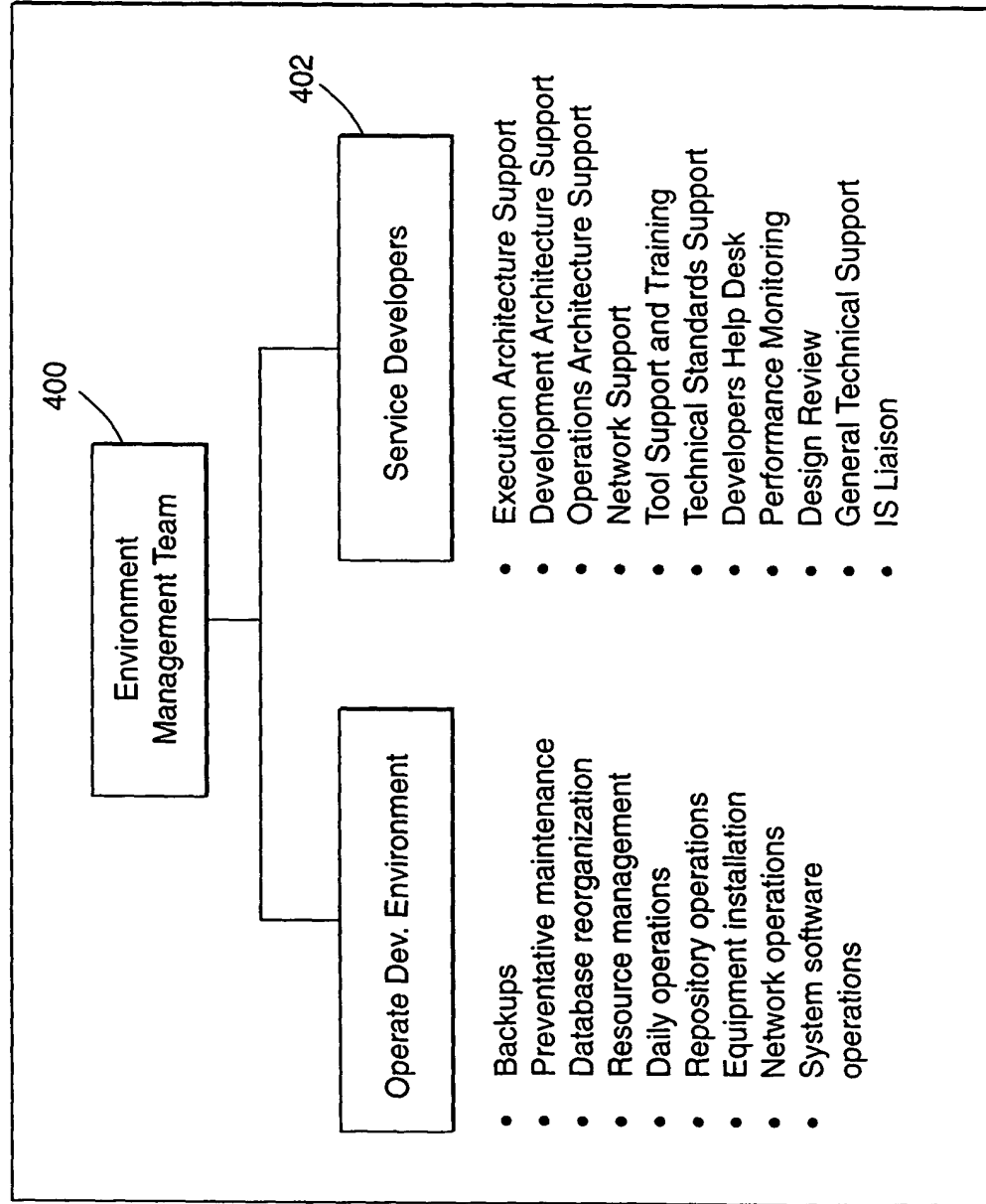


Fig. 55

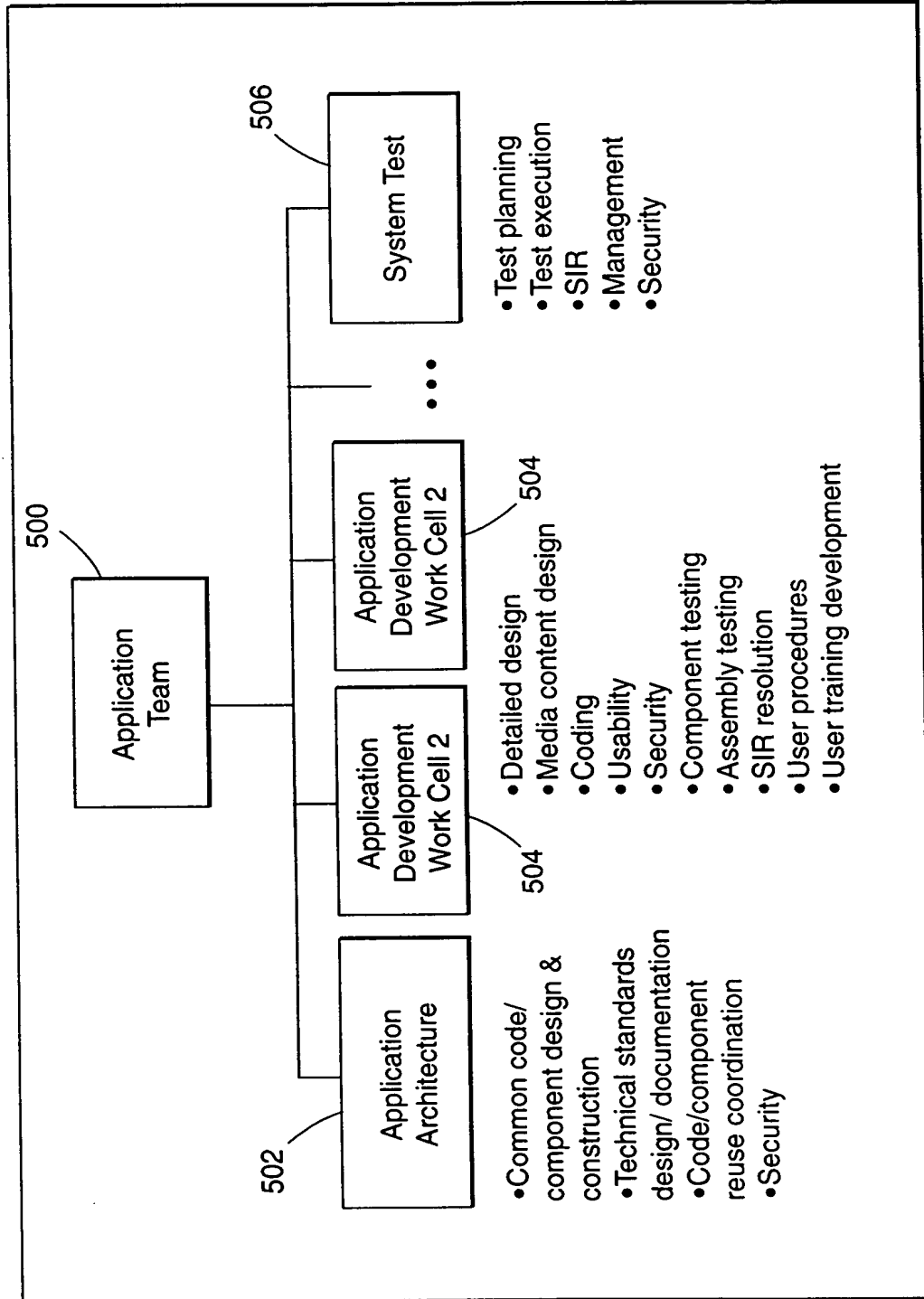


Fig. 56

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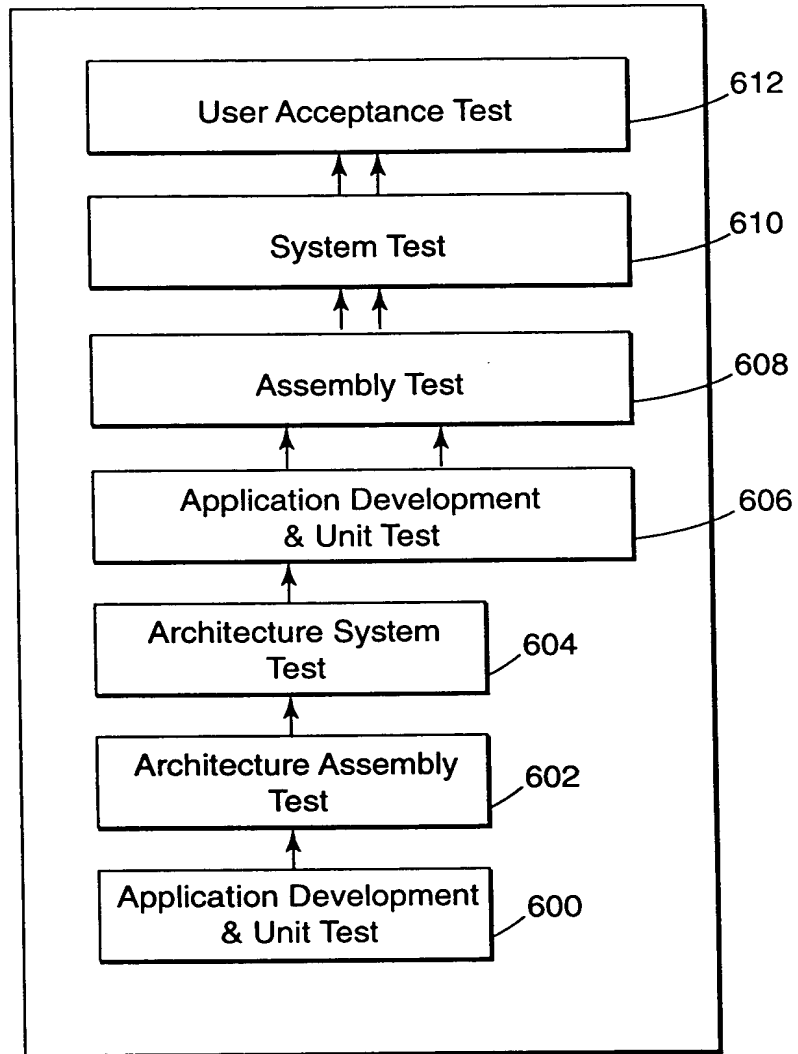


Fig. 57

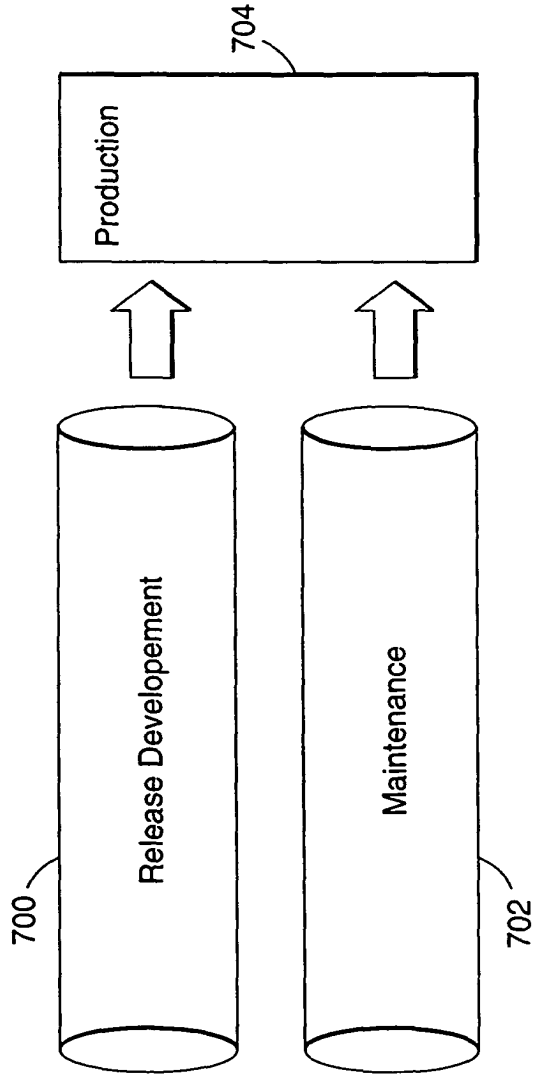


Fig. 58

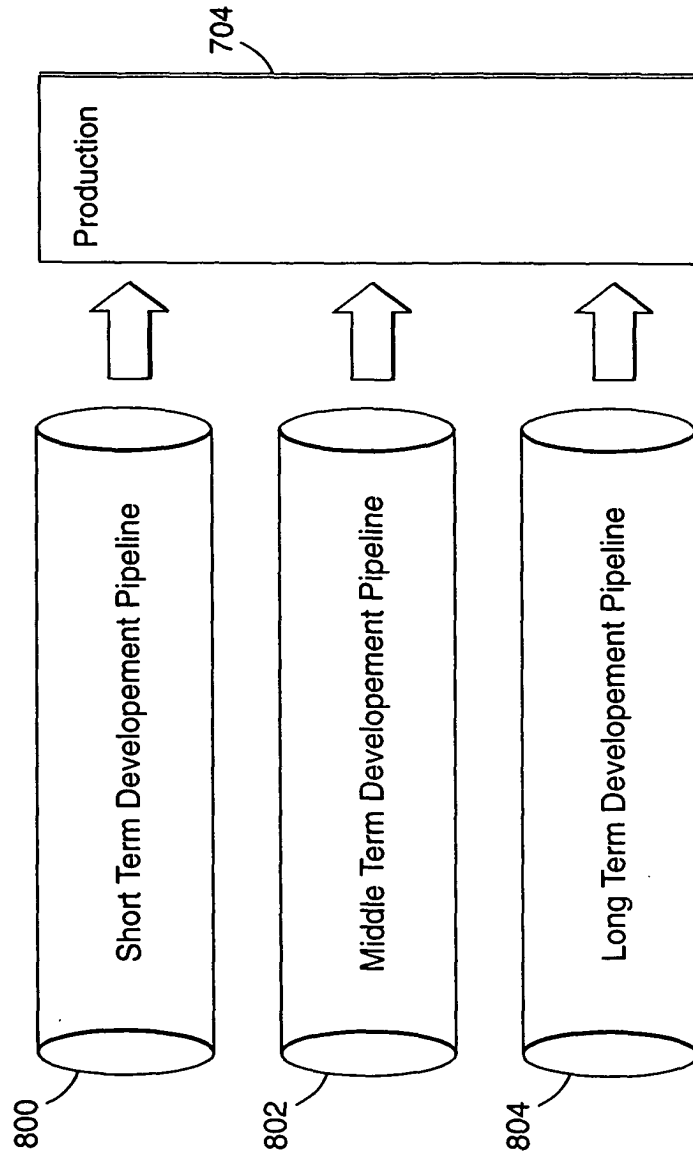


Fig. 59

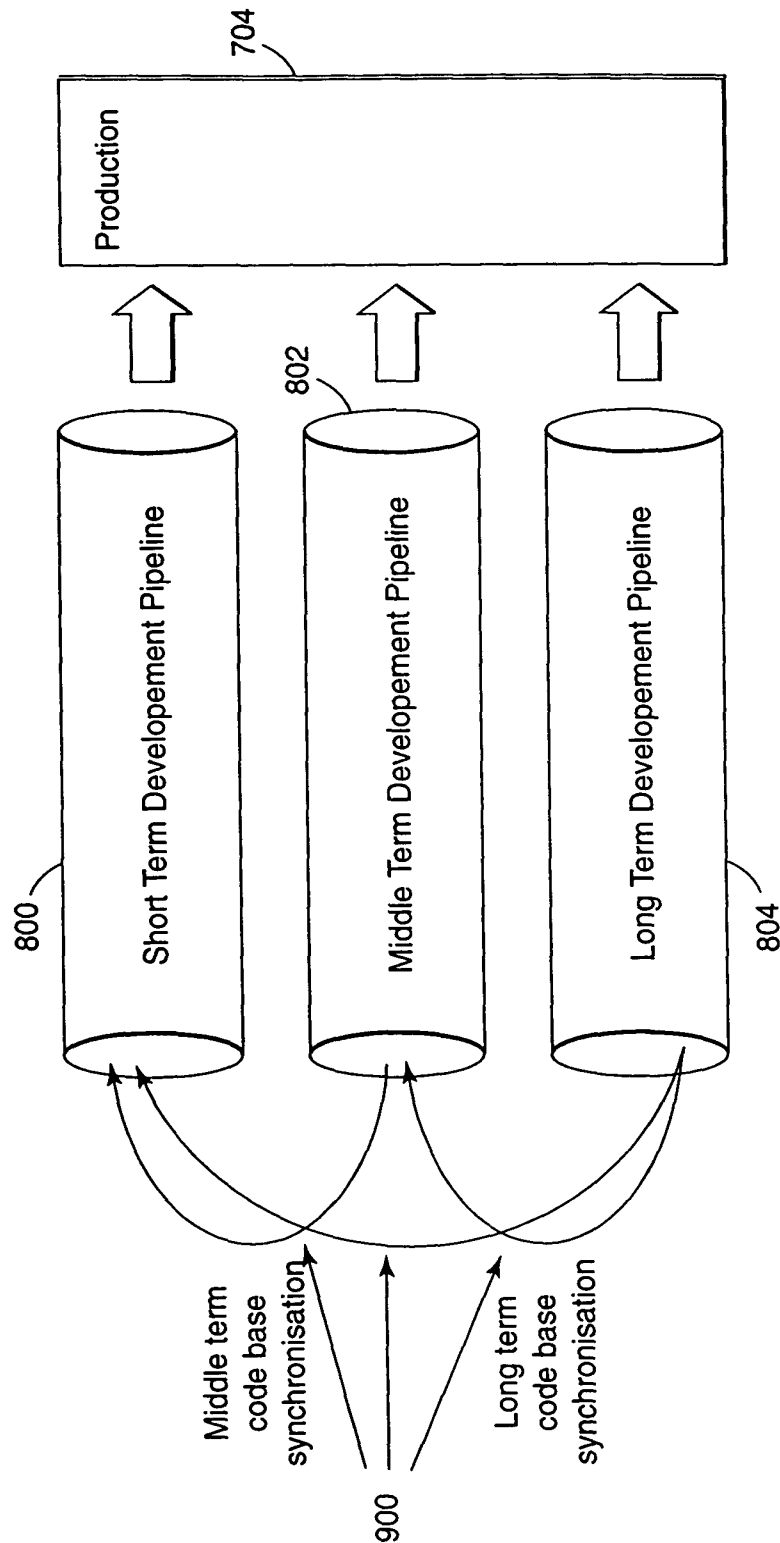


Fig. 60

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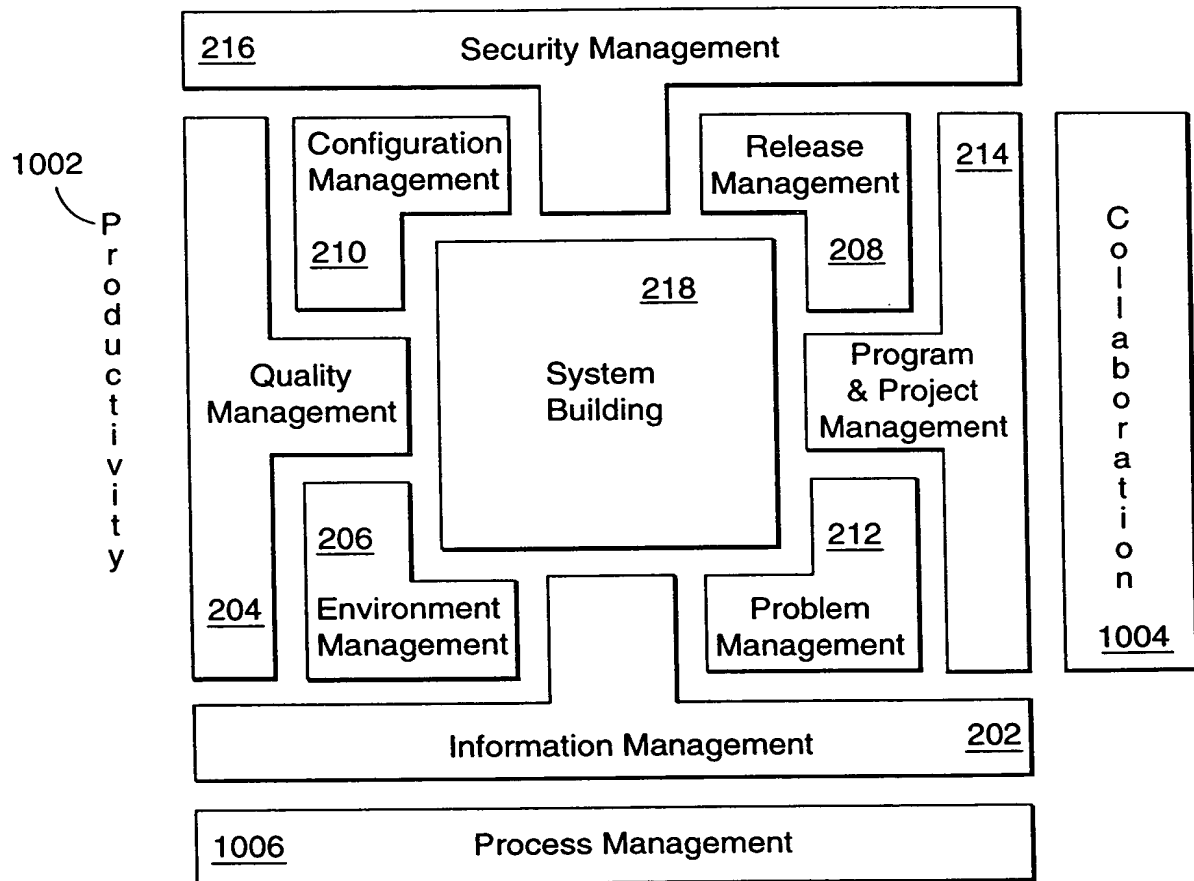


Fig. 61

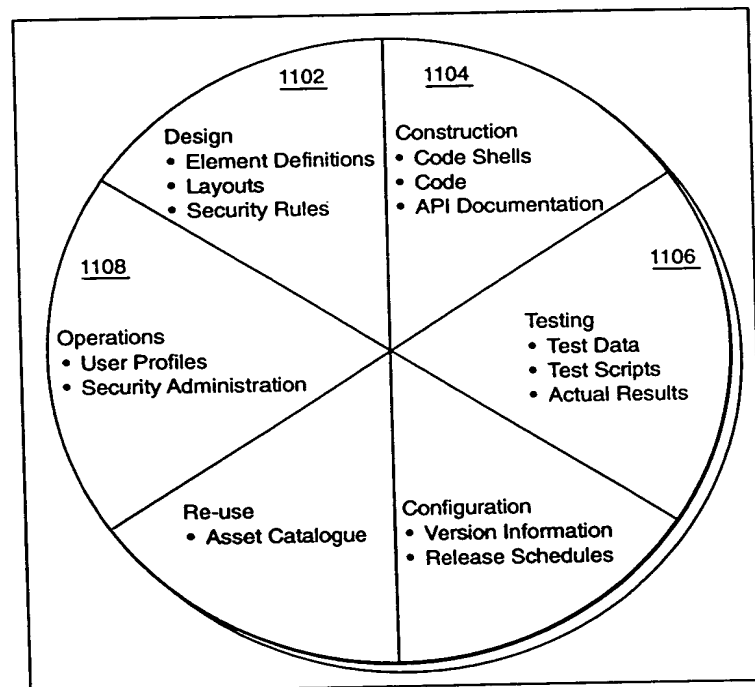


Fig. 62

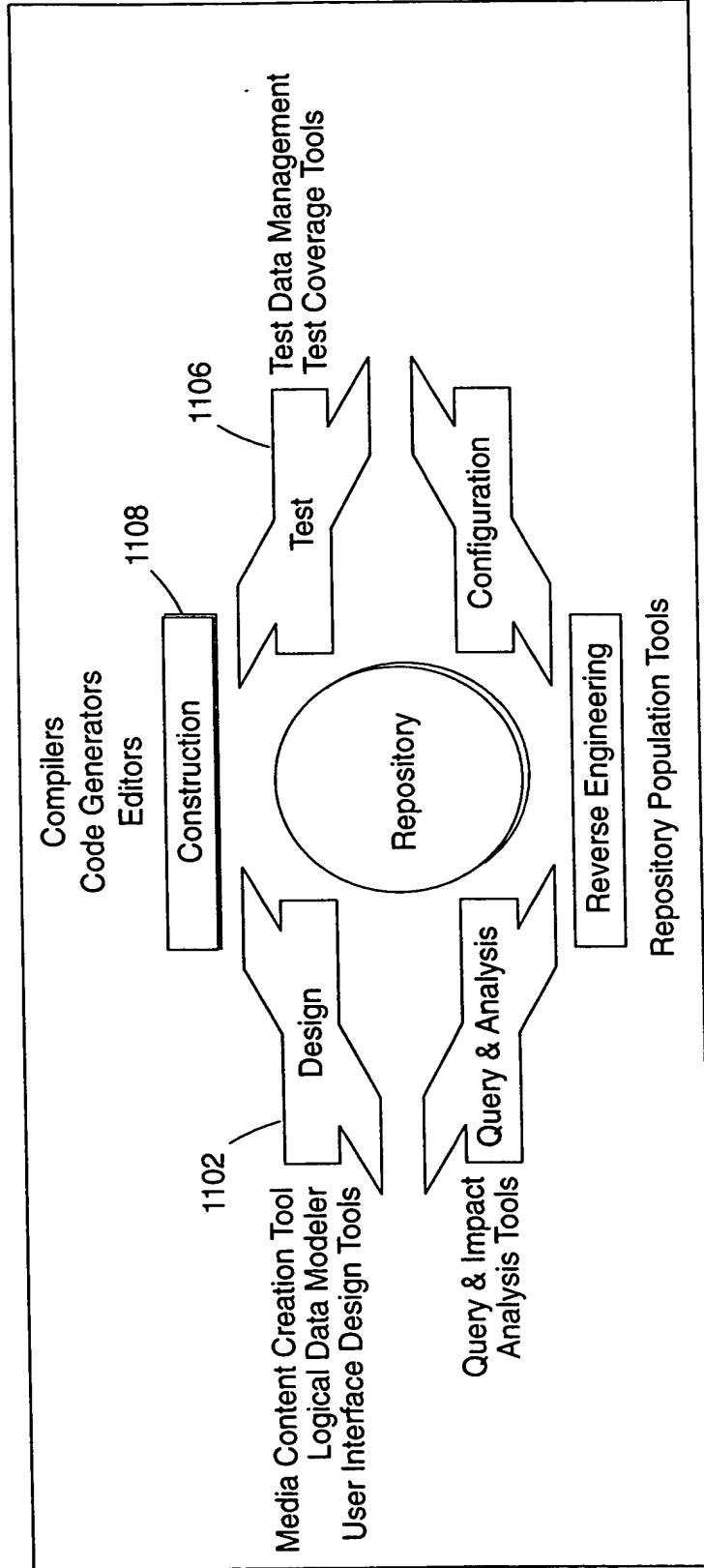


Fig. 63

REPLACEMENT SHEET

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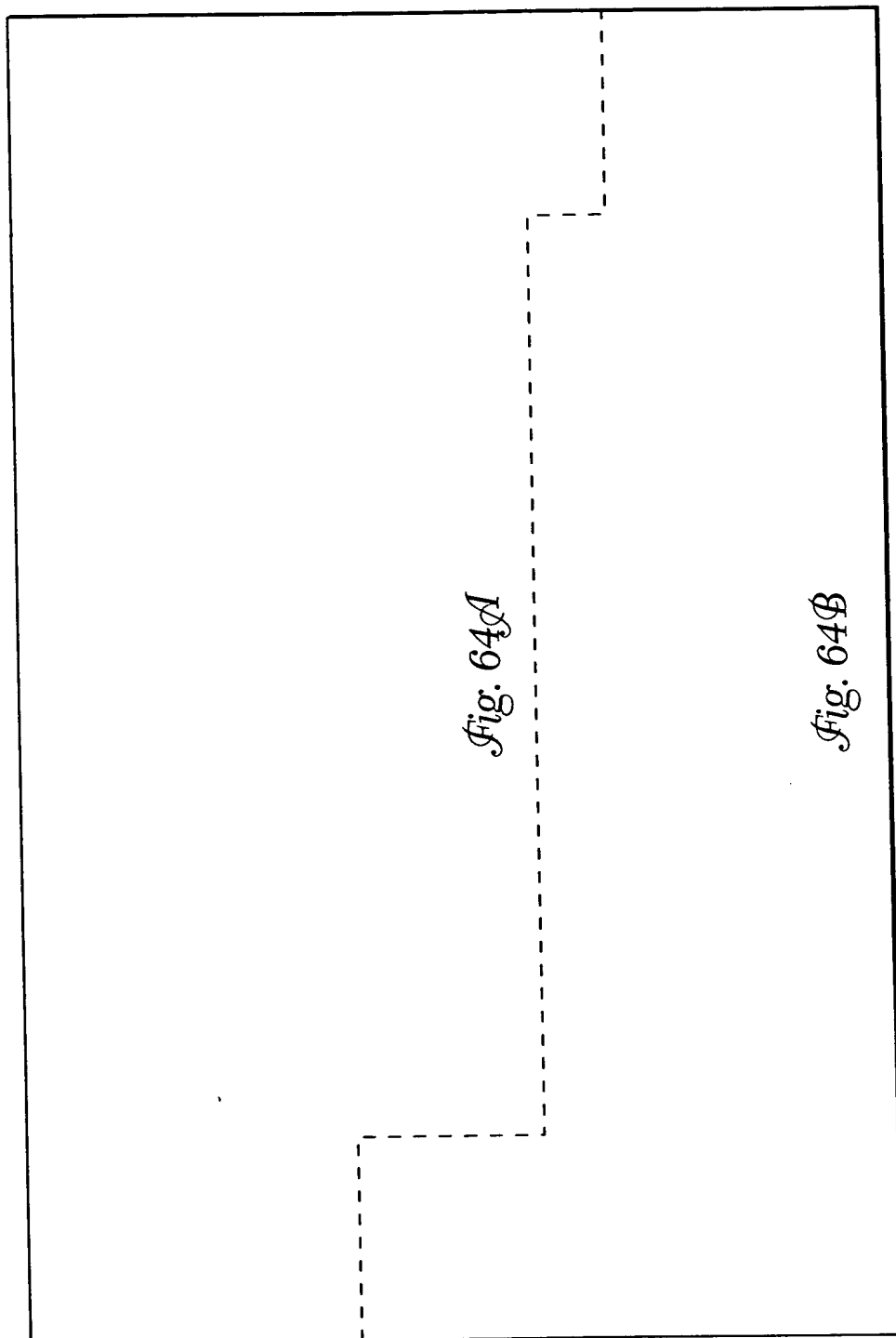
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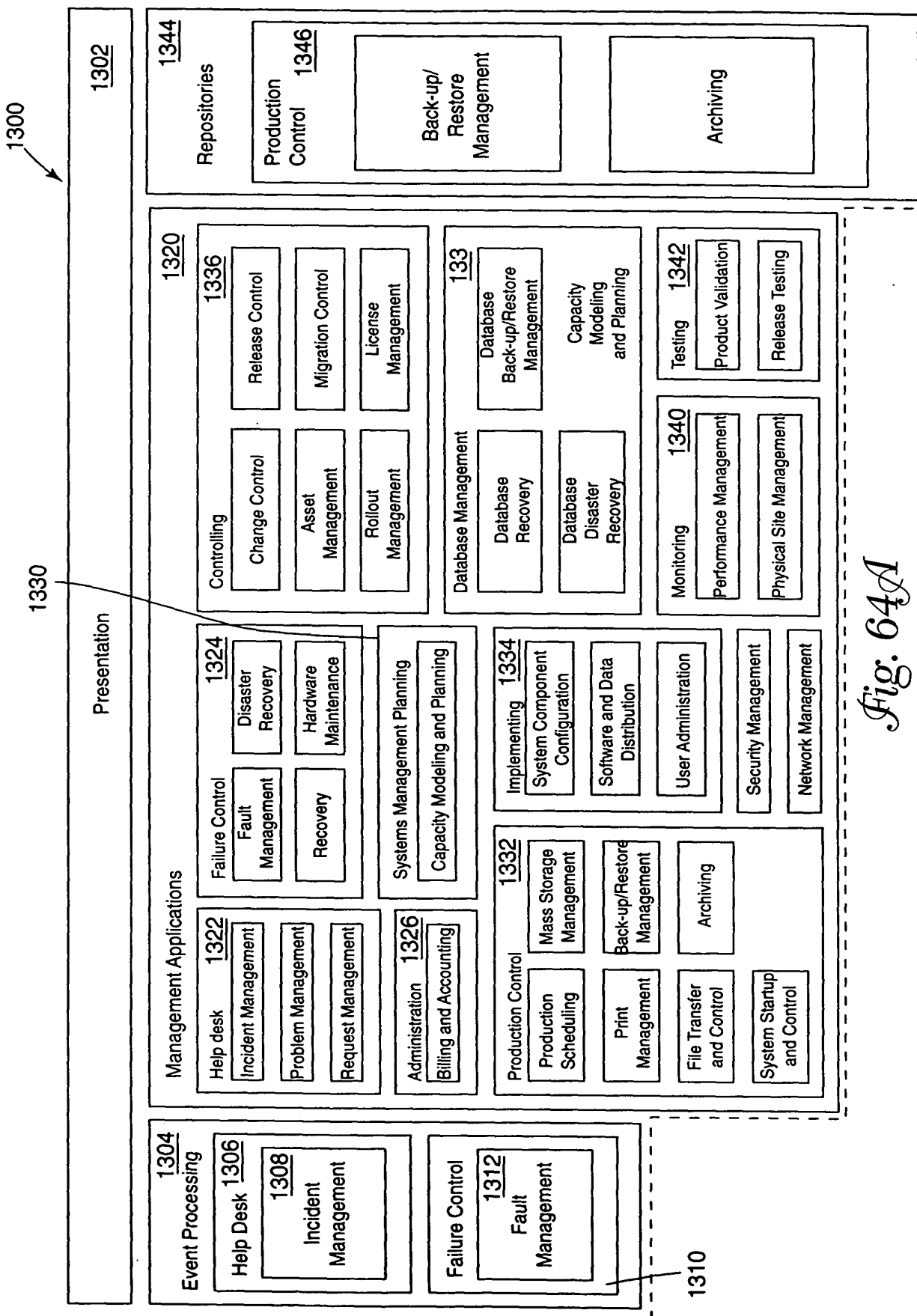


Fig. 64A

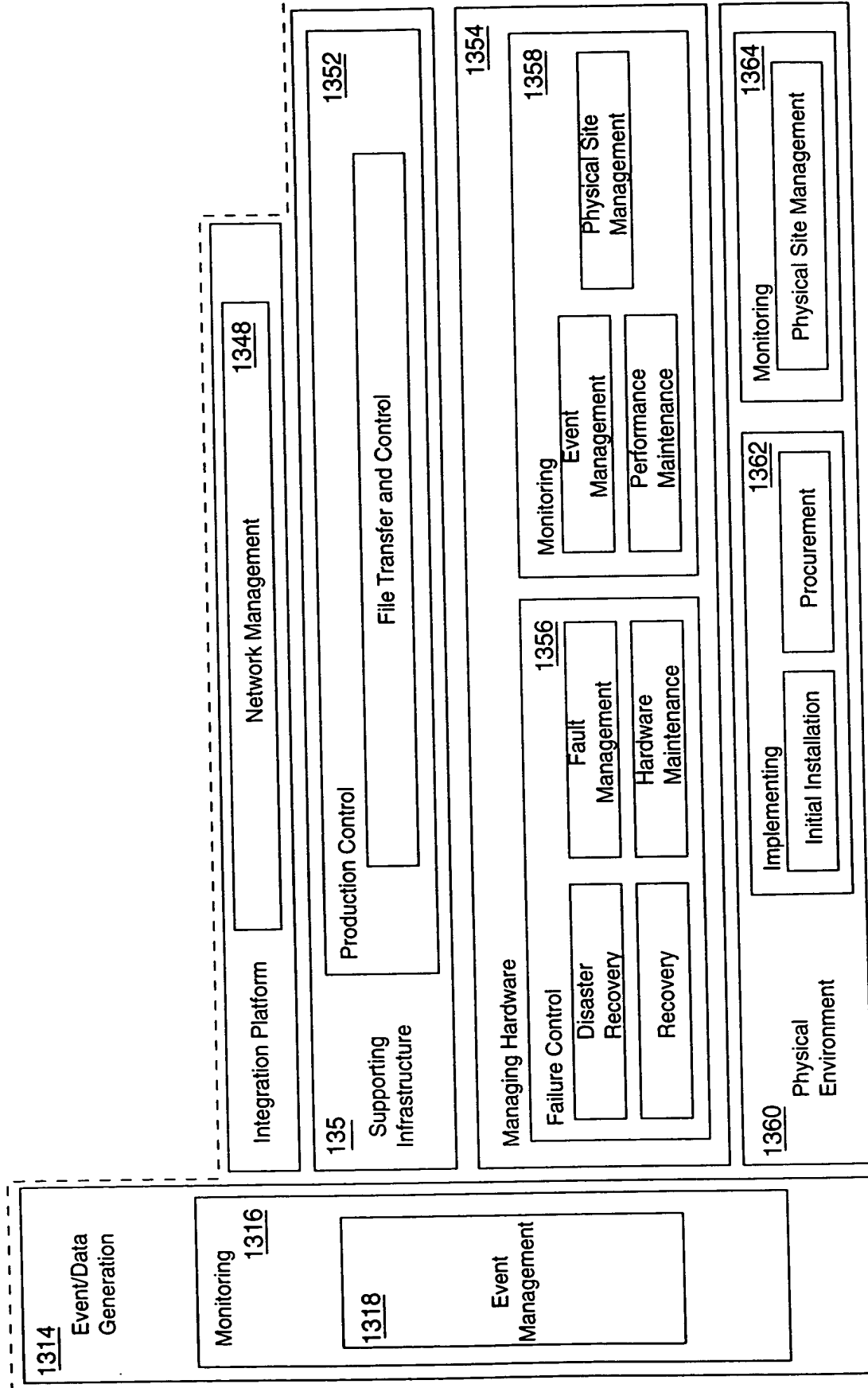


Fig. 64B

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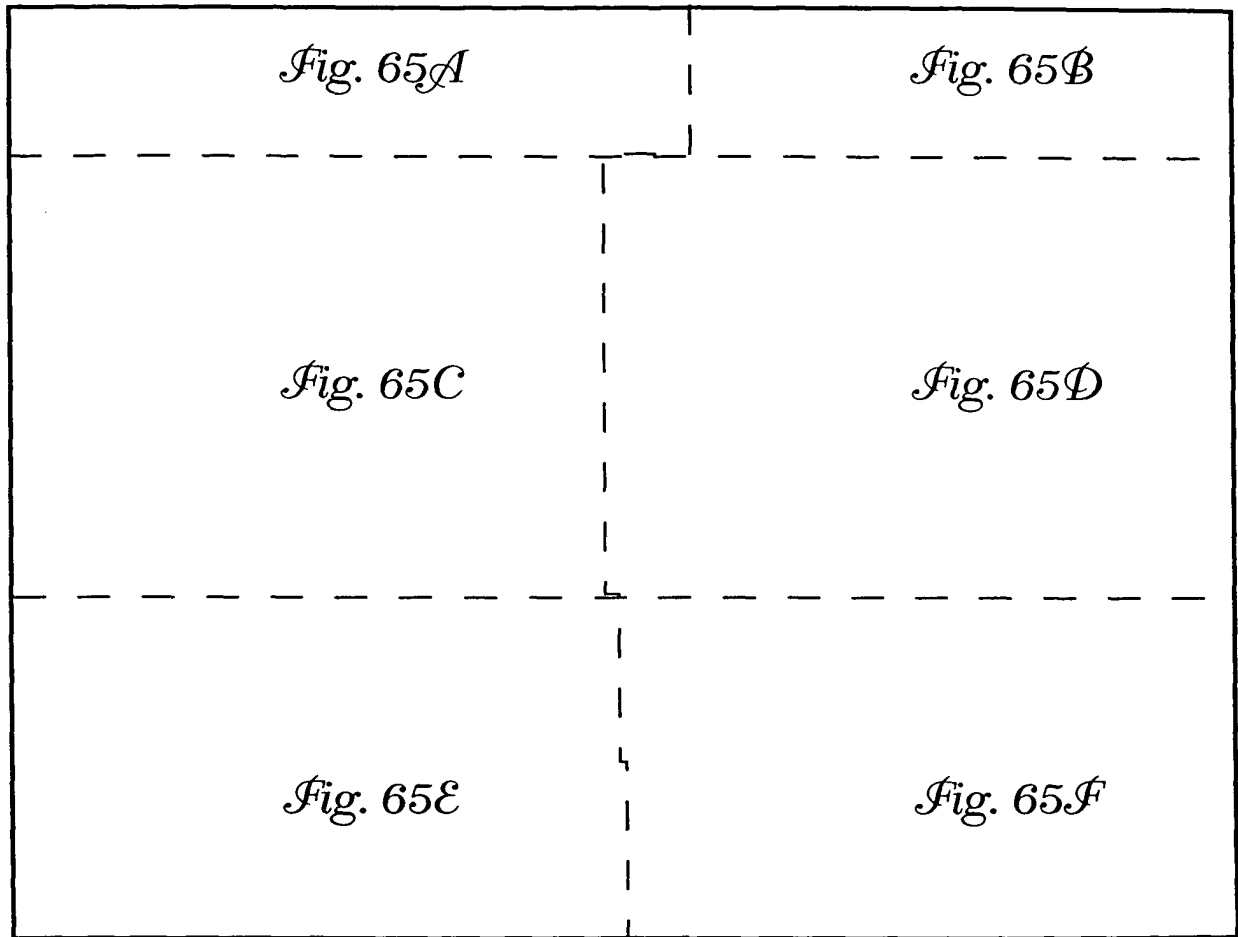


Fig. 65

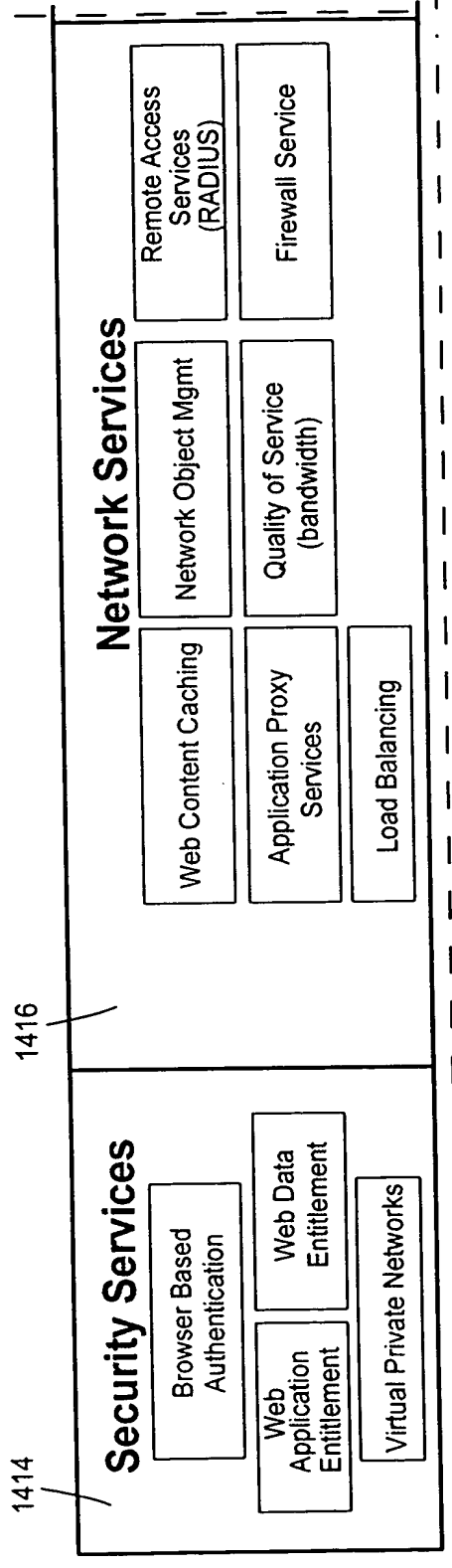


Fig. 65A

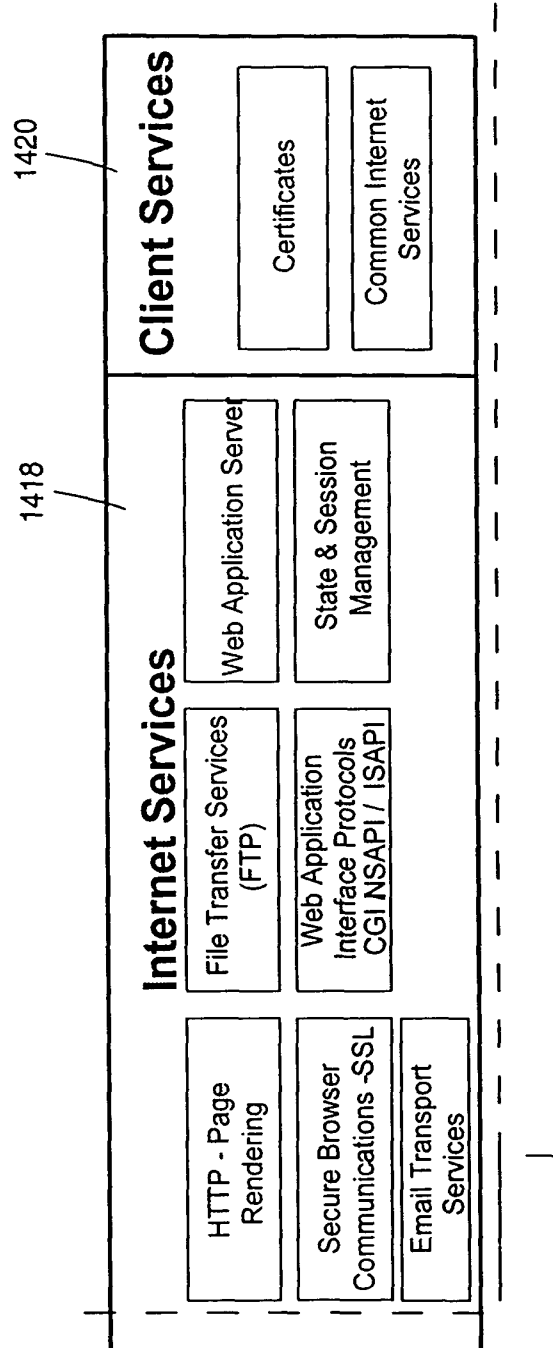


Fig. 65B

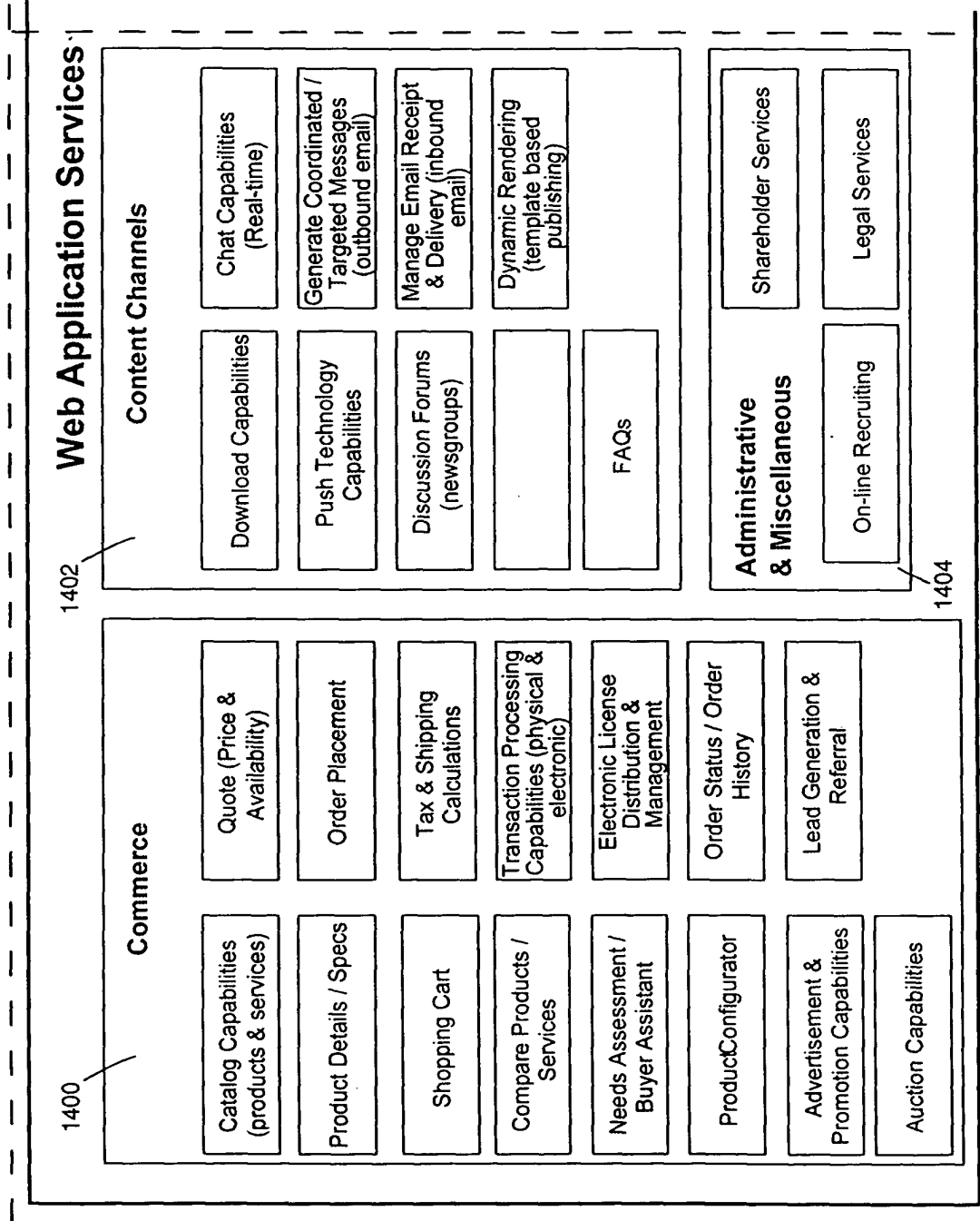


Fig. 65C

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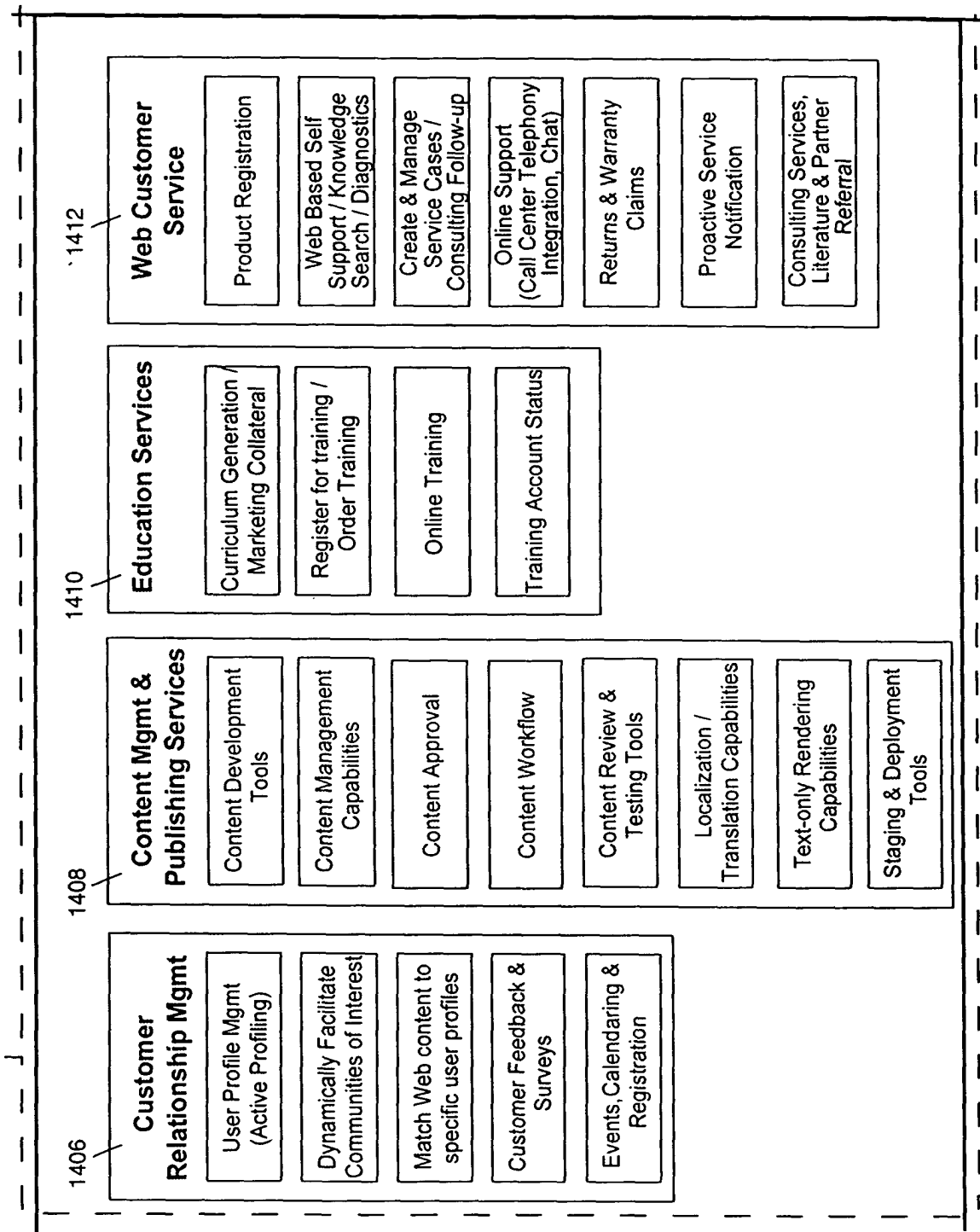


Fig. 65D

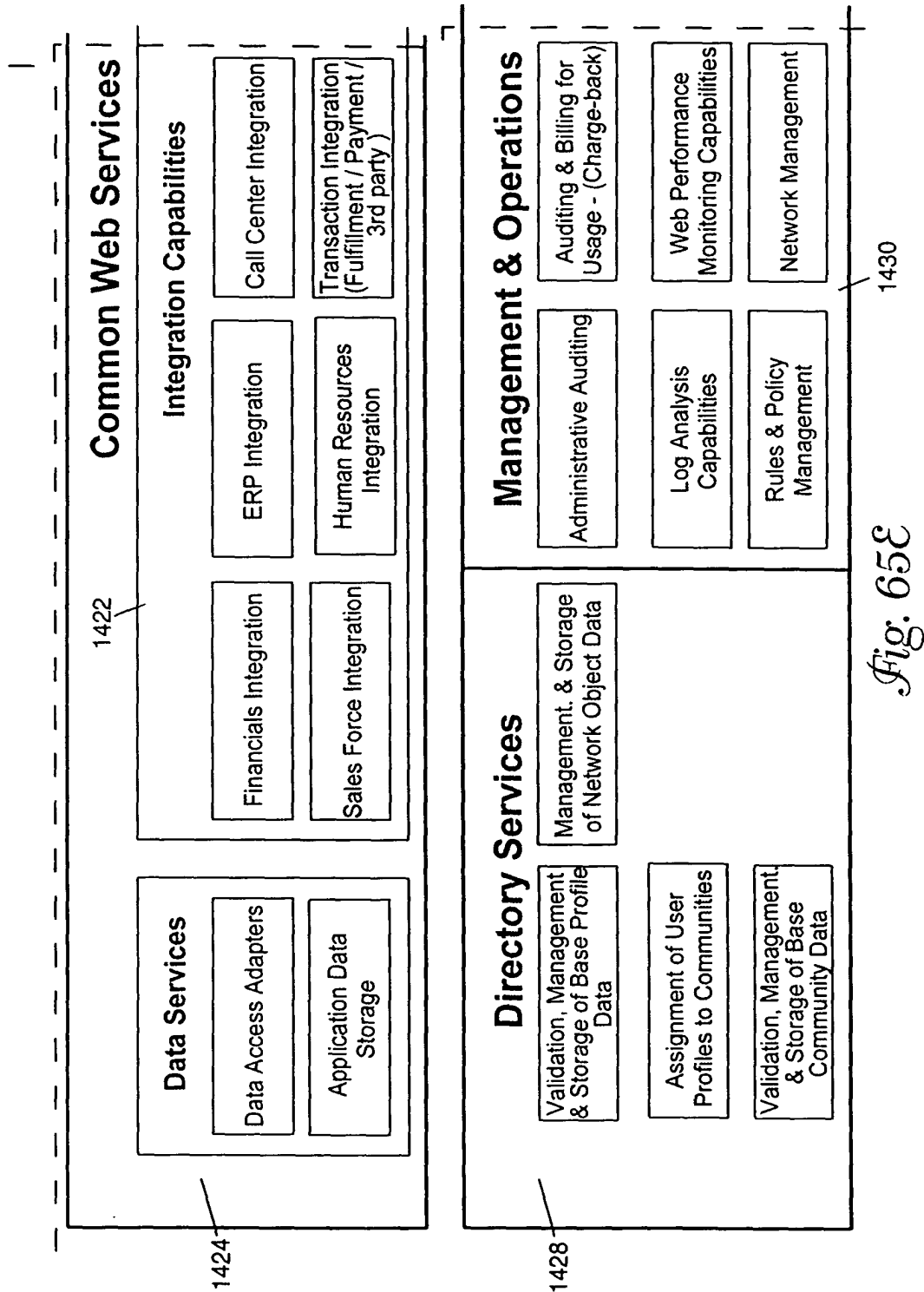


Fig. 65E

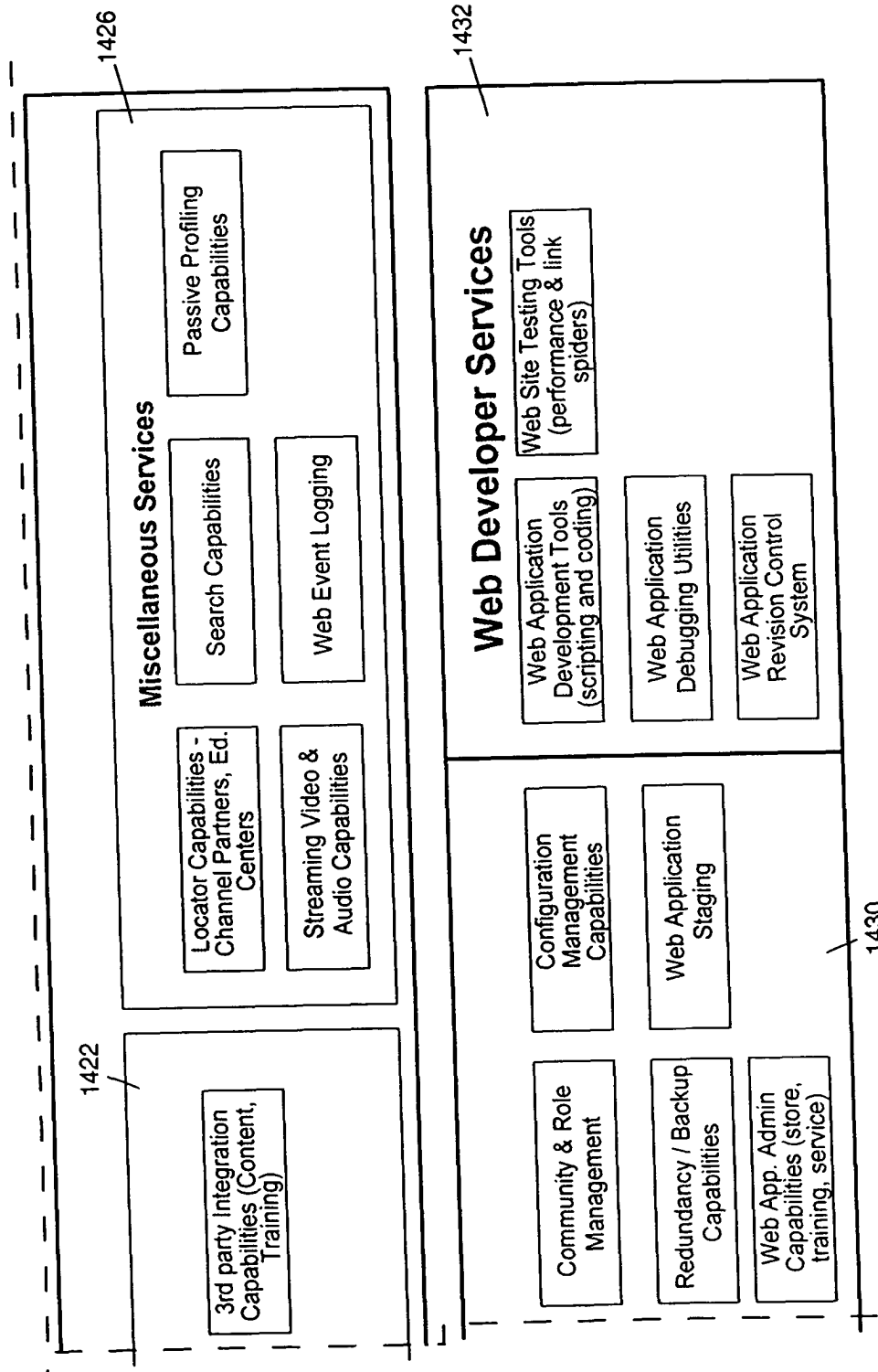


Fig. 65F

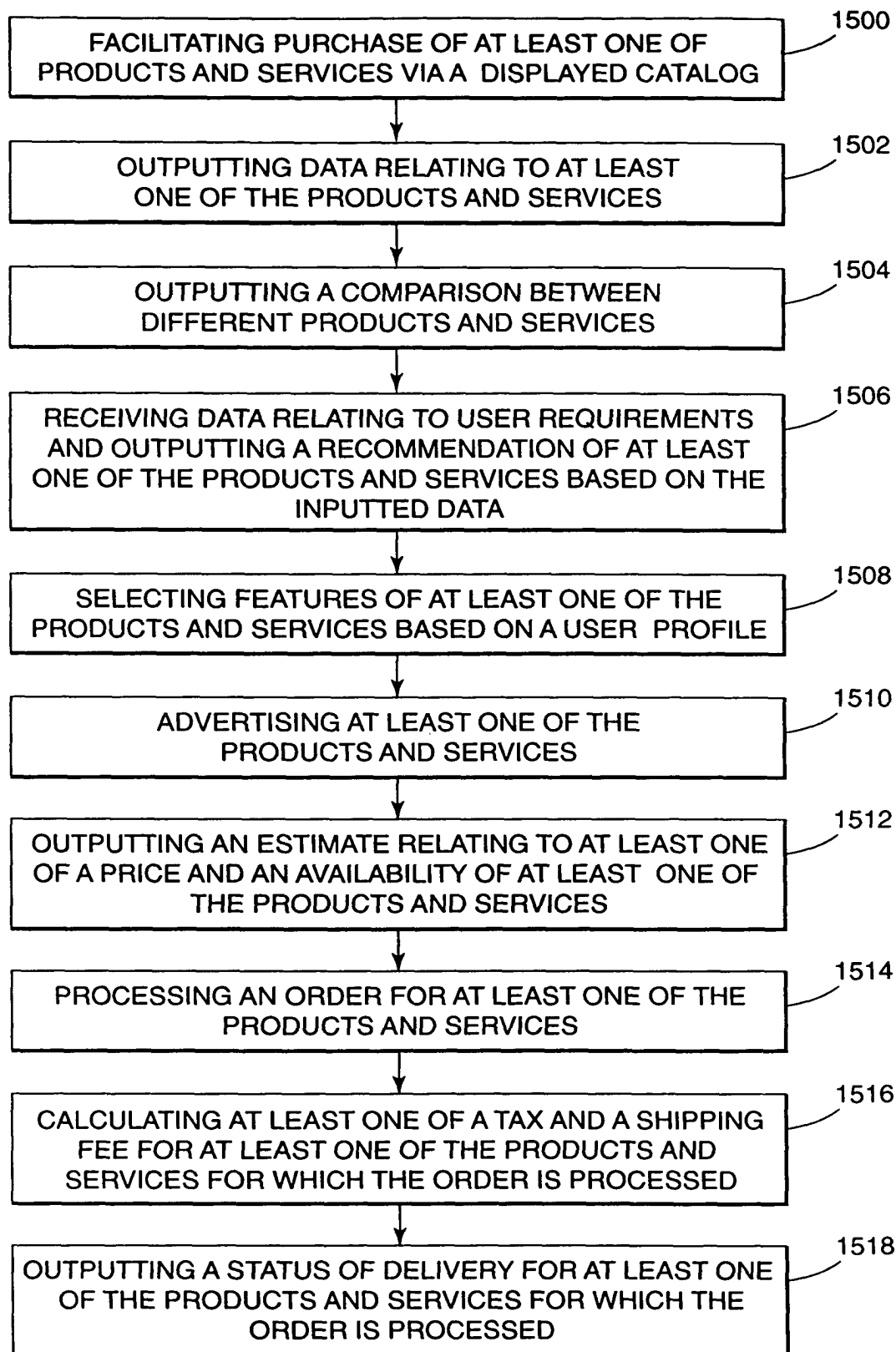


Fig. 66

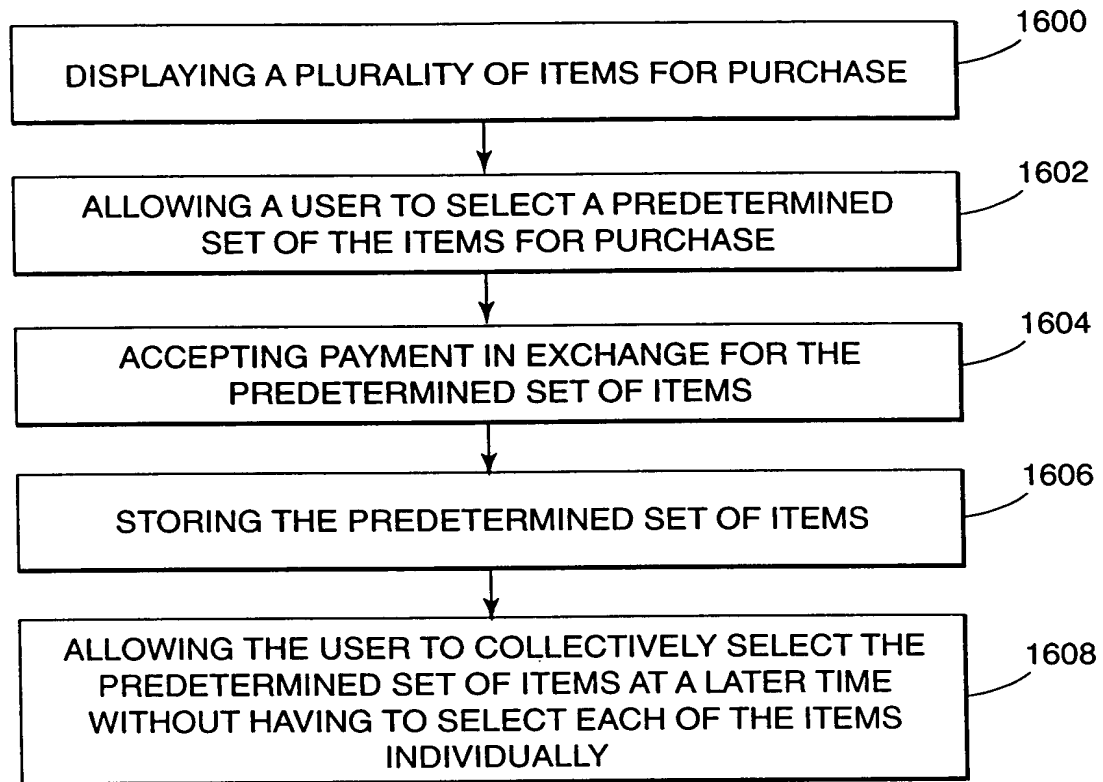


Fig. 67

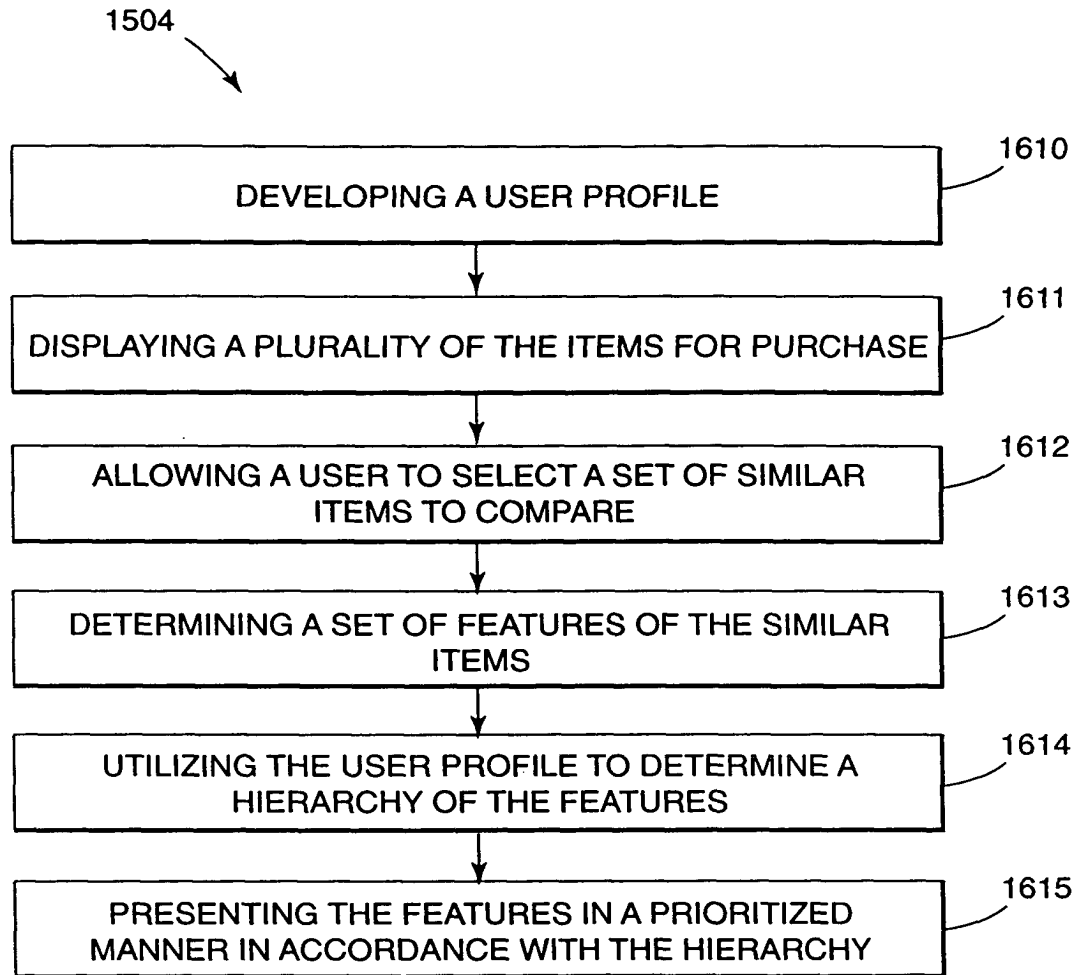


Fig. 68

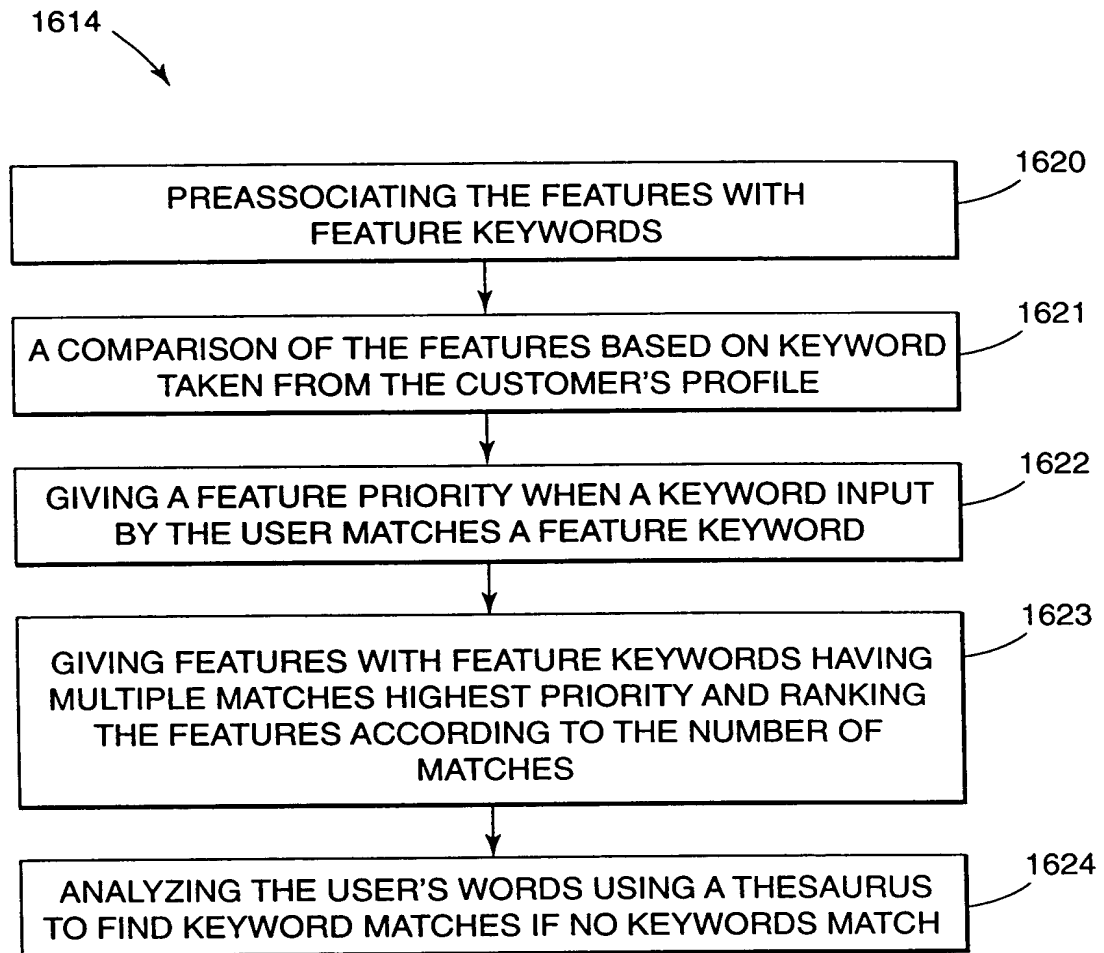


Fig. 69

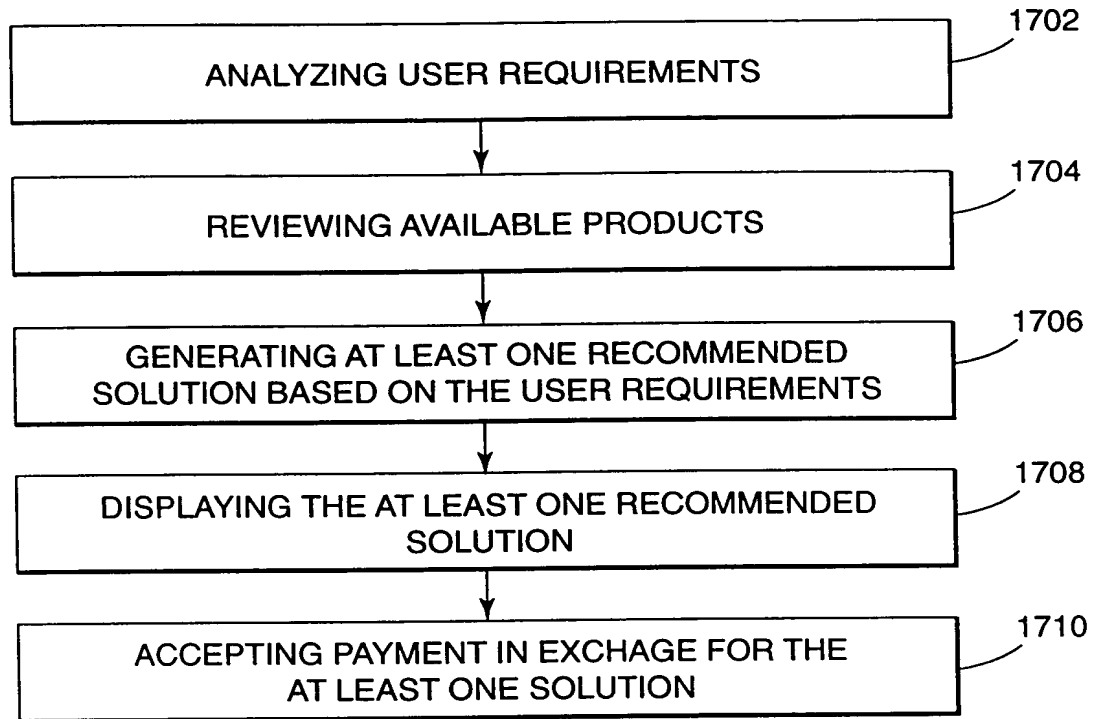


Fig. 70

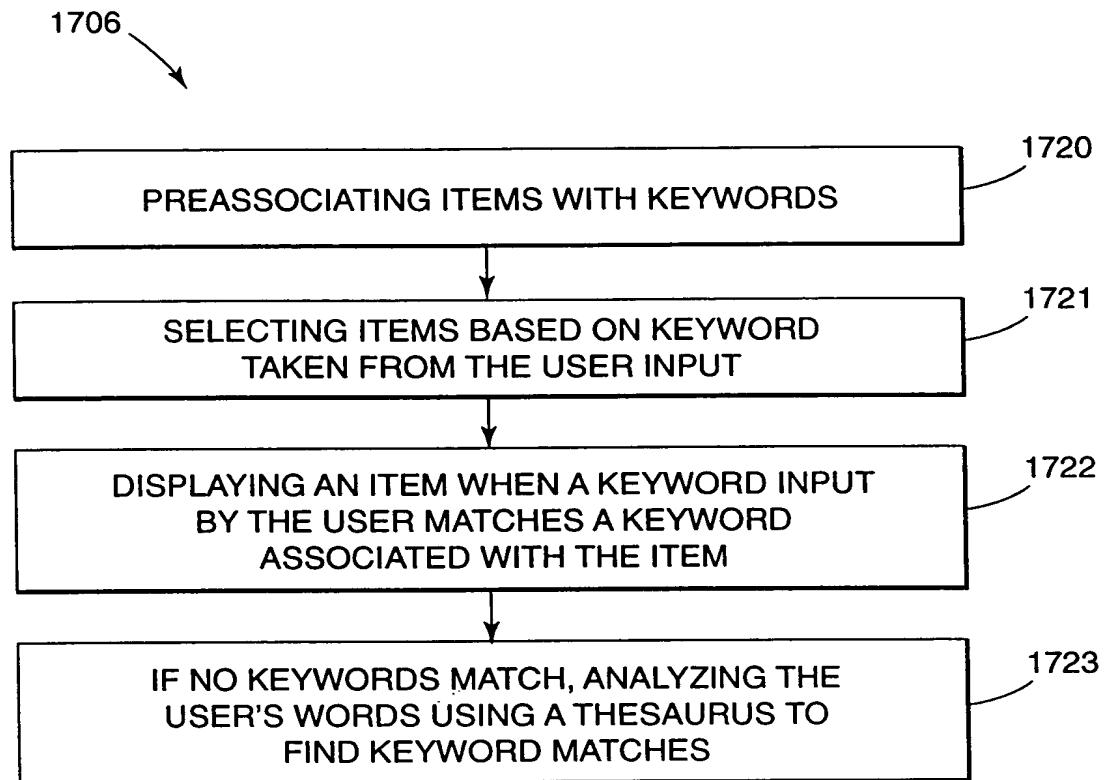


Fig. 71

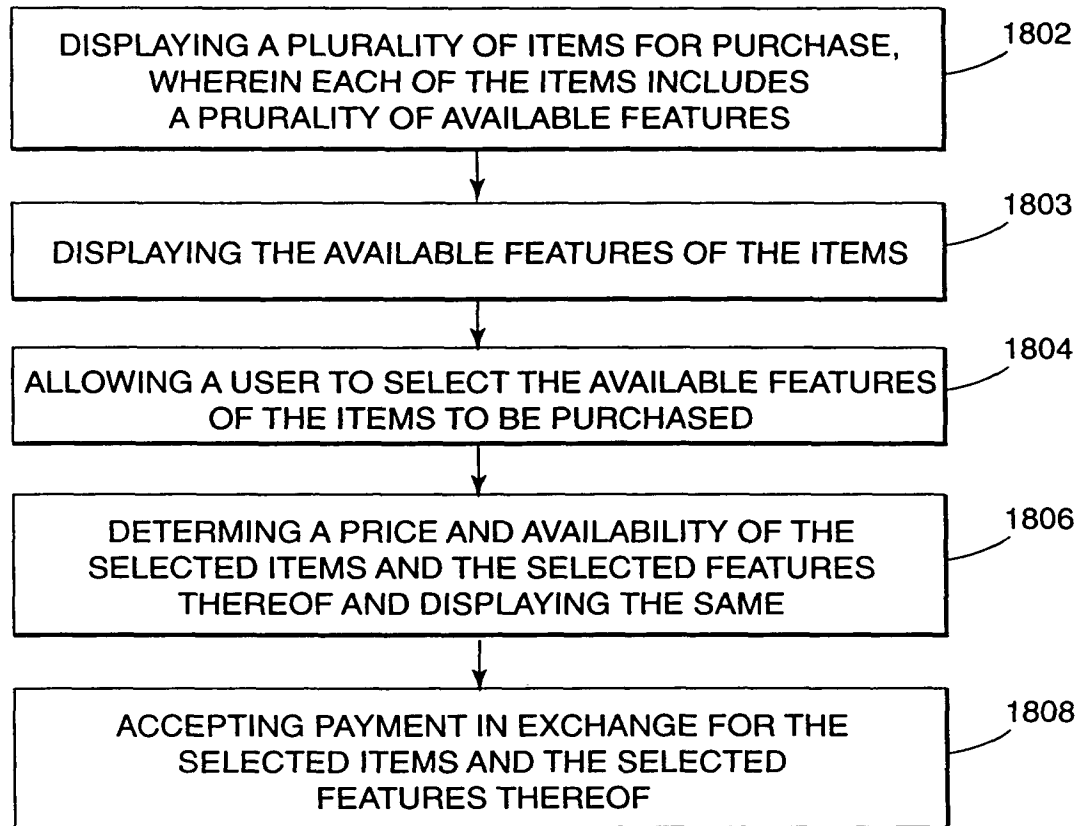


Fig. 72

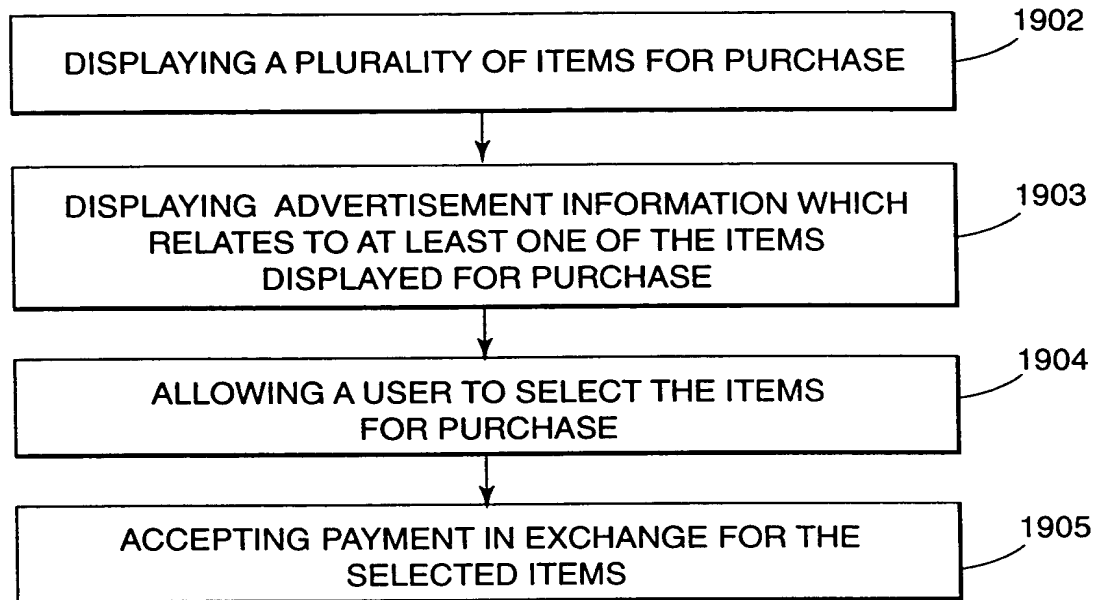


Fig. 73

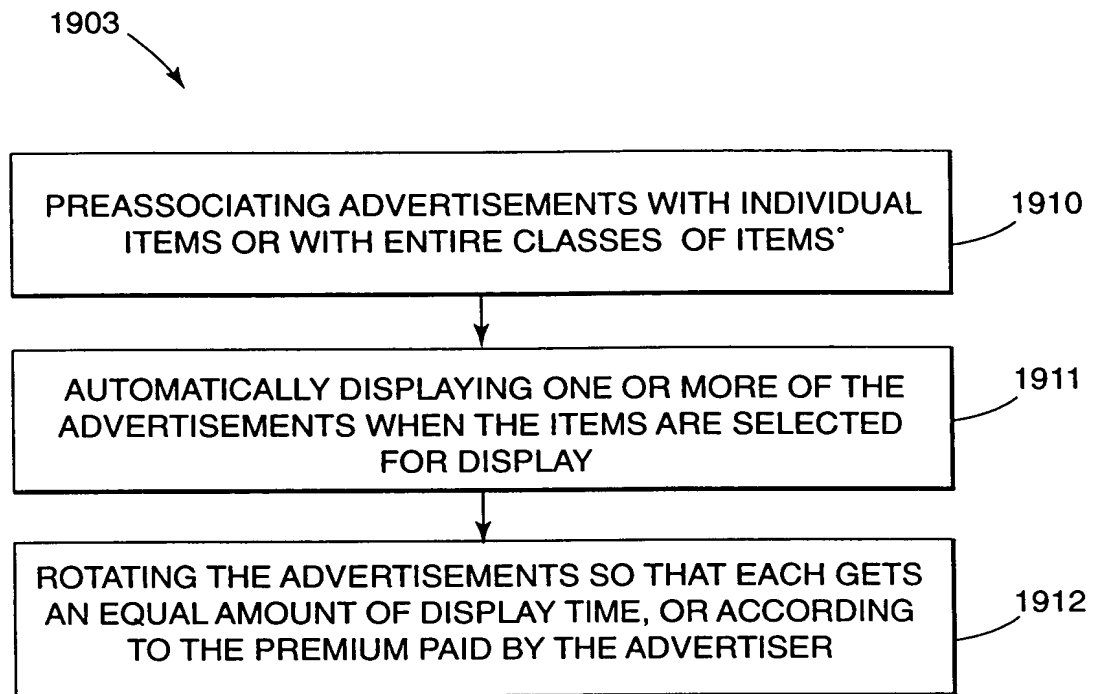


Fig. 74

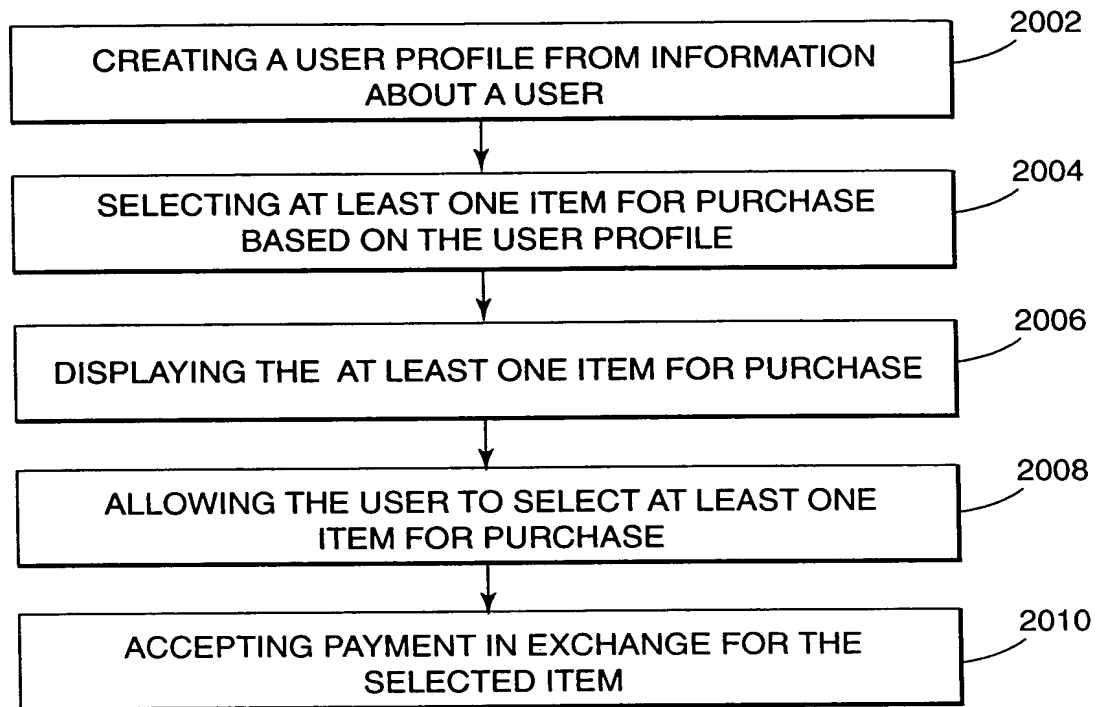


Fig. 75

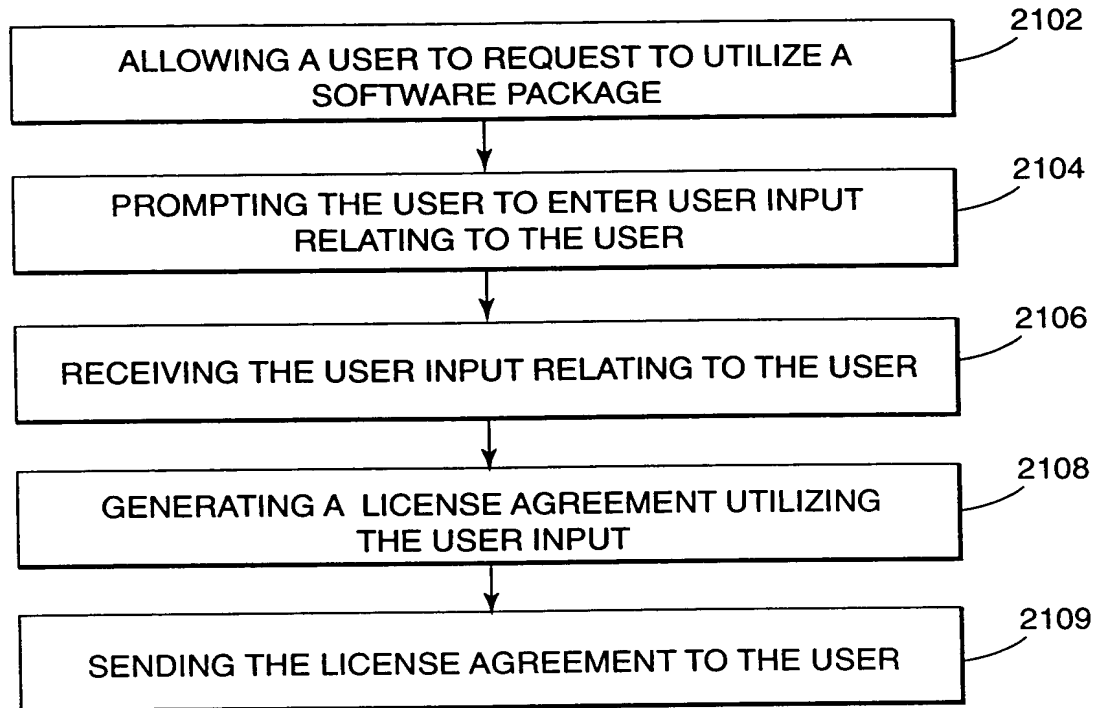


Fig. 76

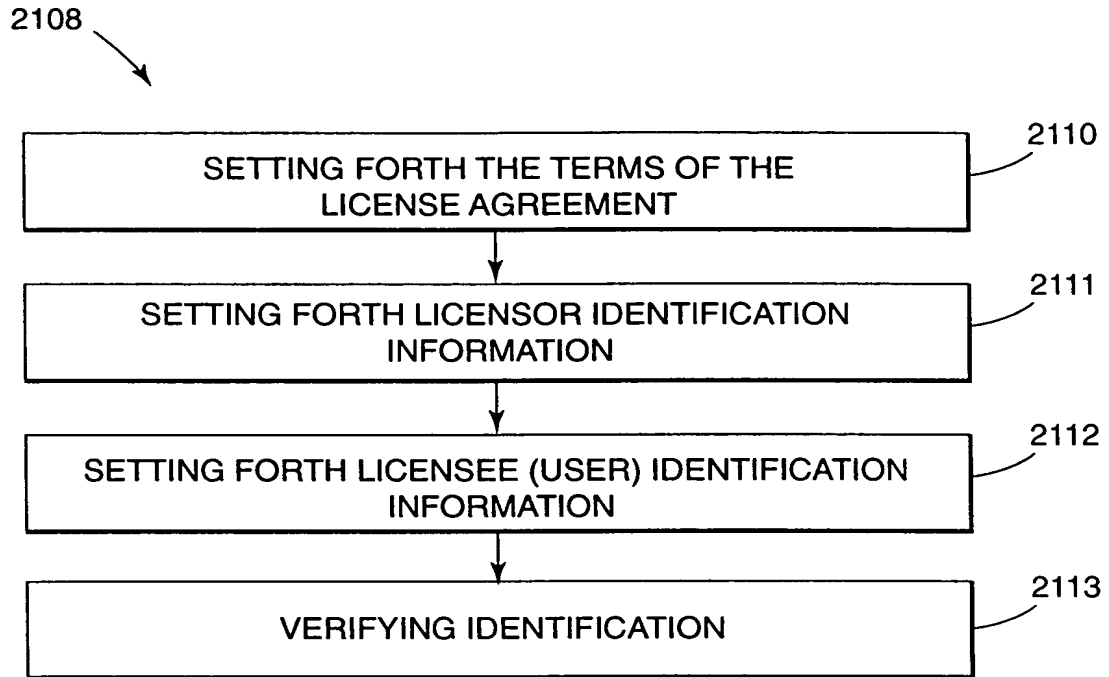


Fig. 77

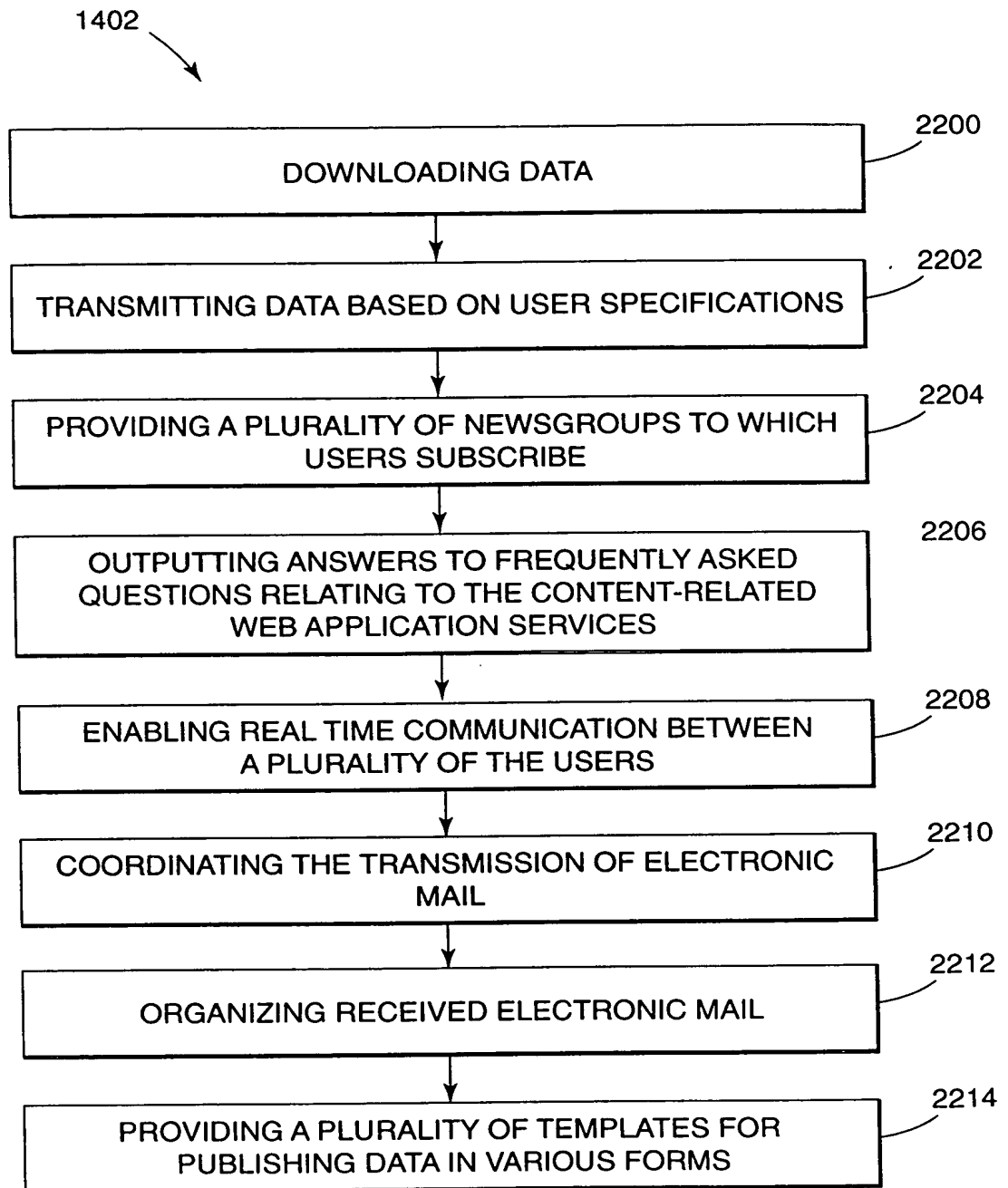


Fig. 78

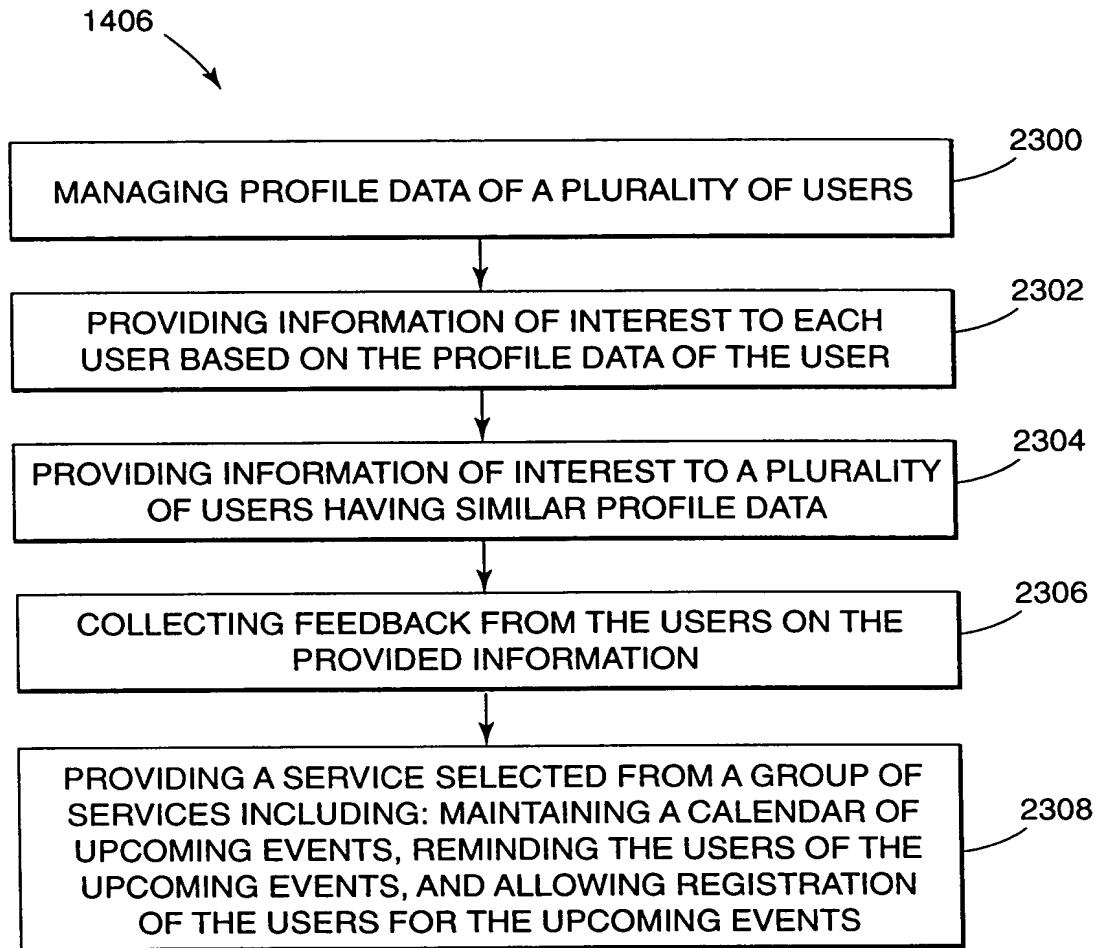


Fig. 79

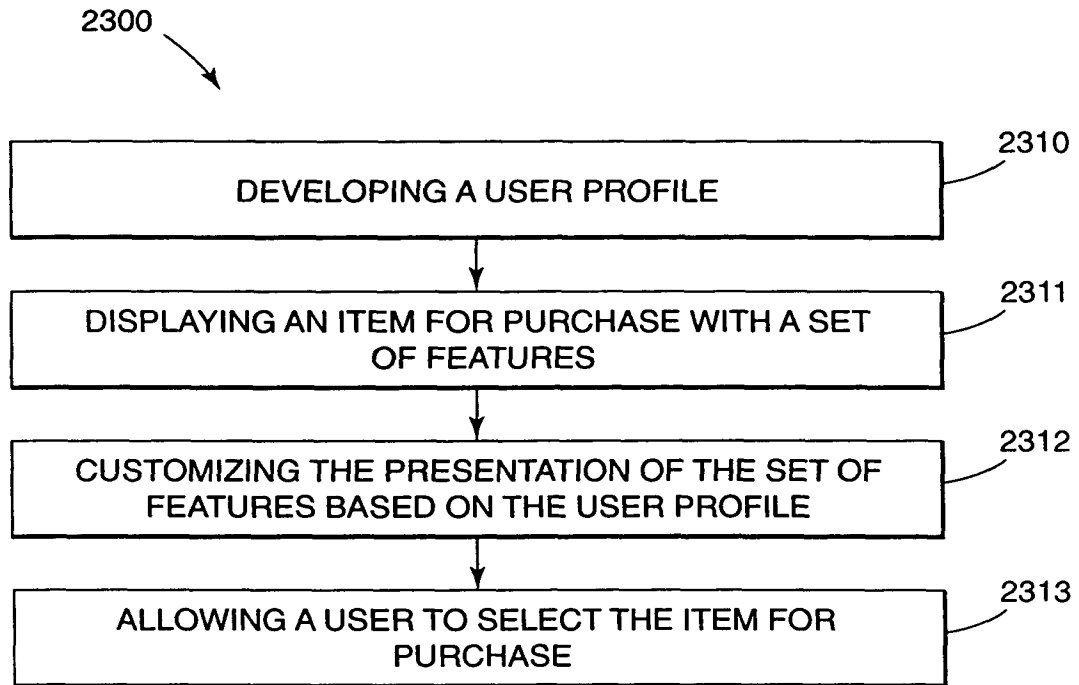


Fig. 80

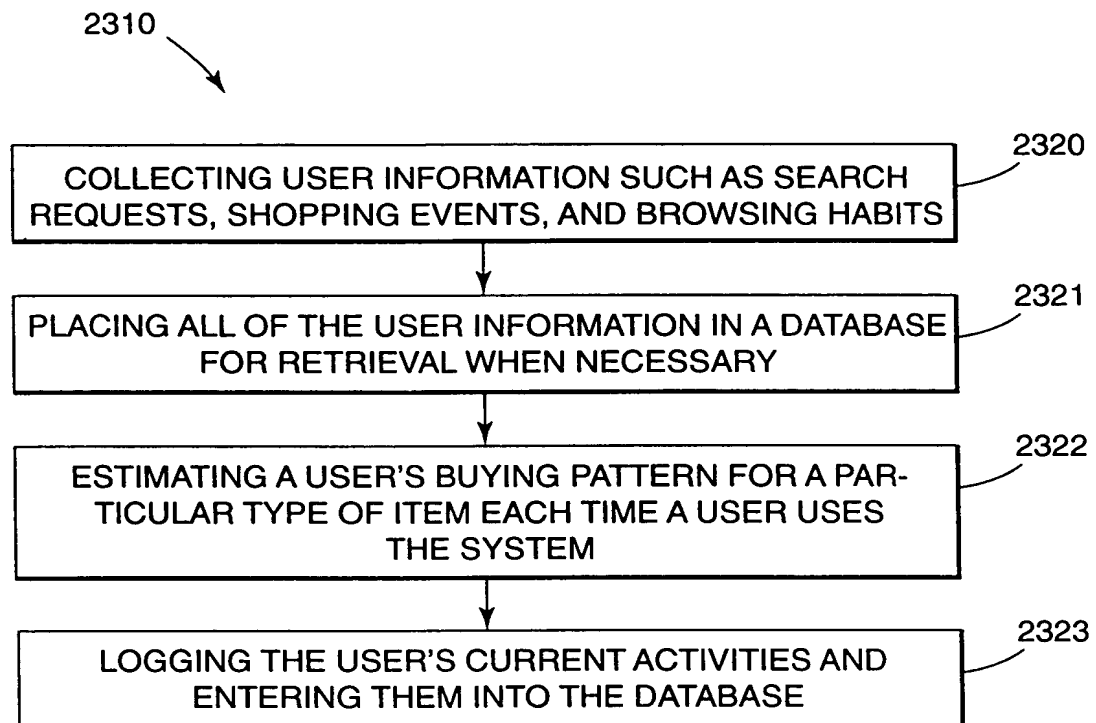


Fig. 81

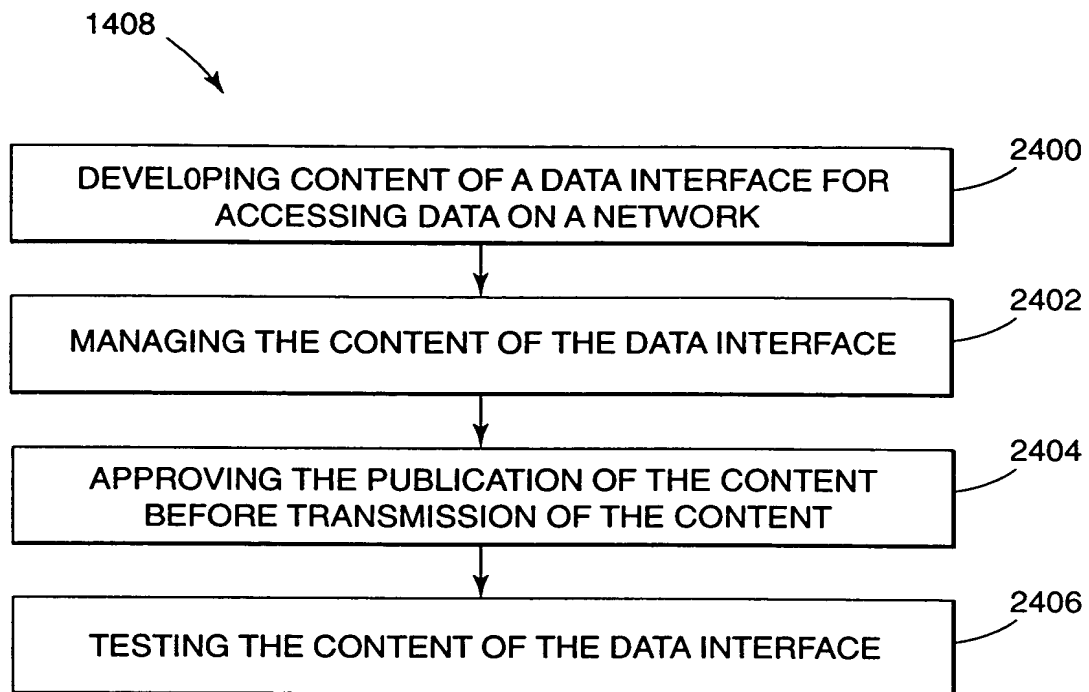


Fig. 82

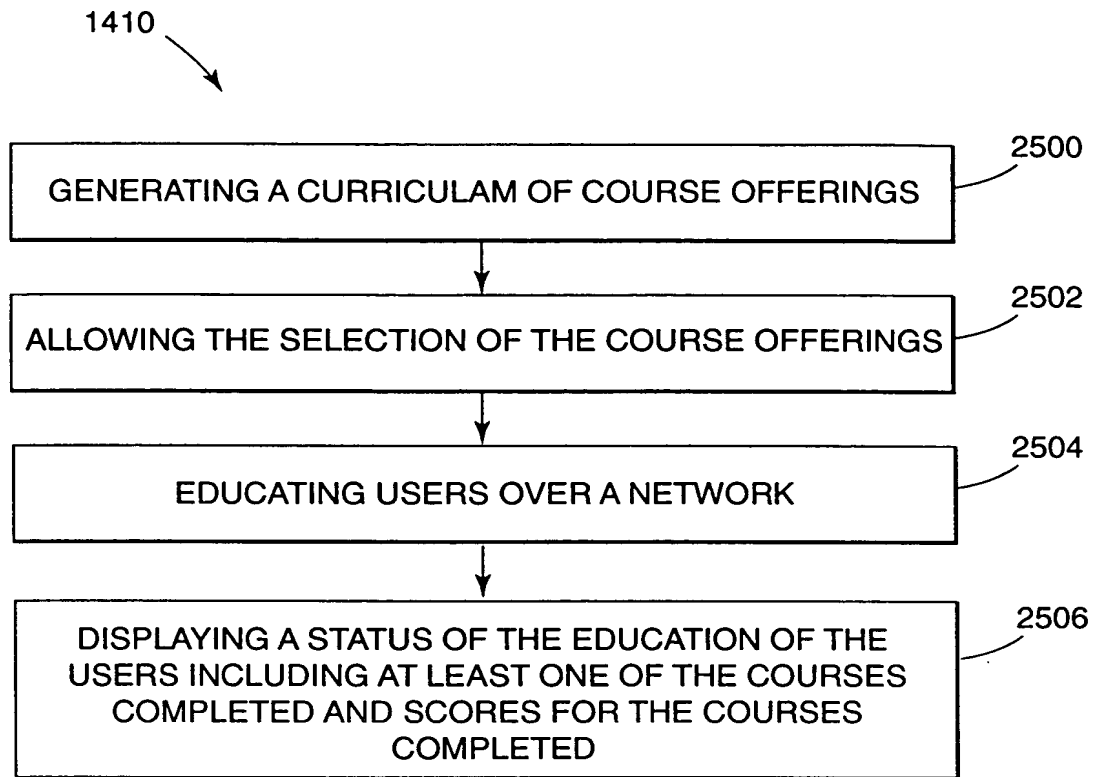


Fig. 83

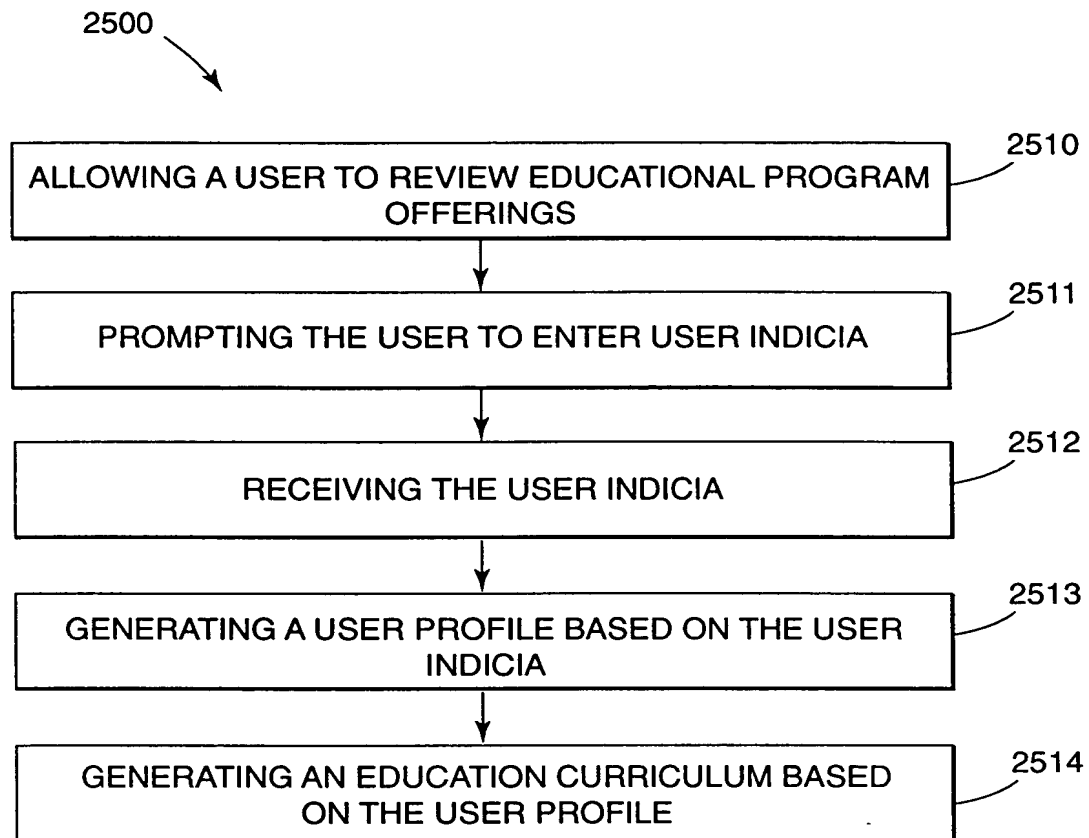


Fig. 84

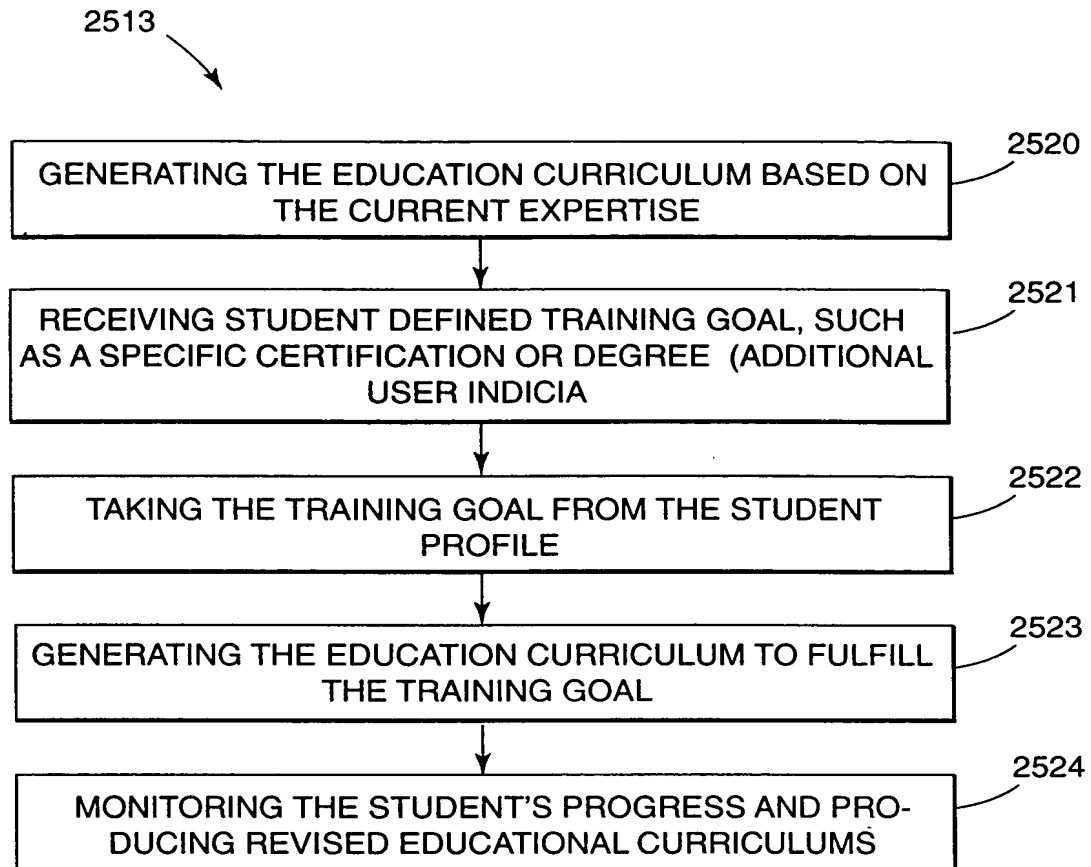


Fig. 85

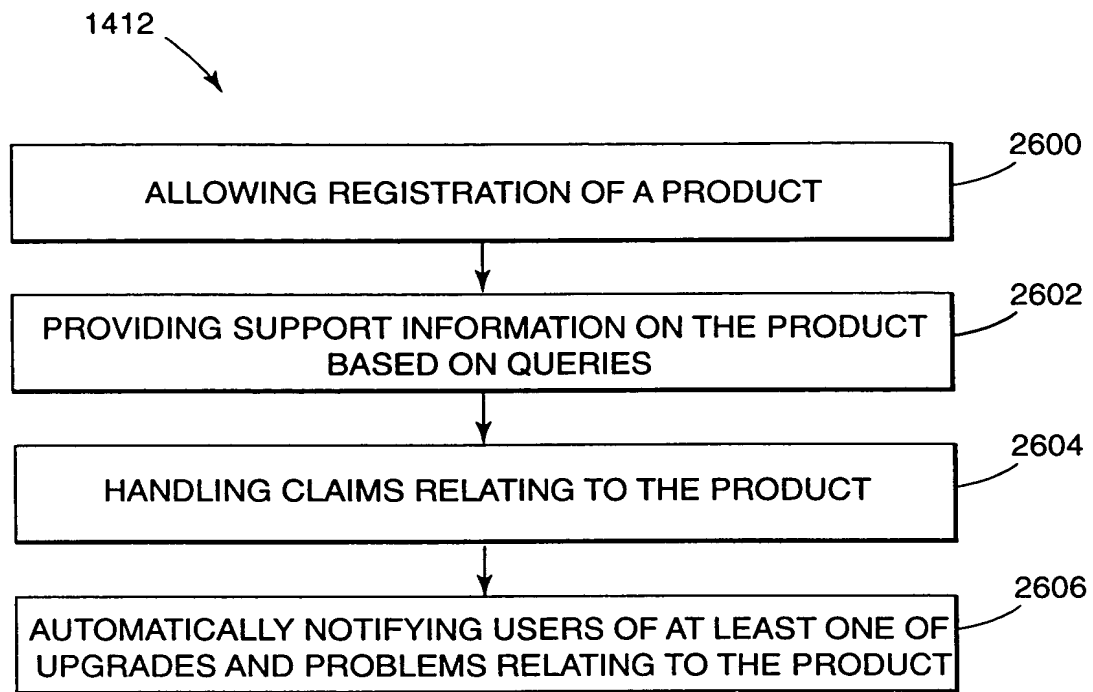


Fig. 86

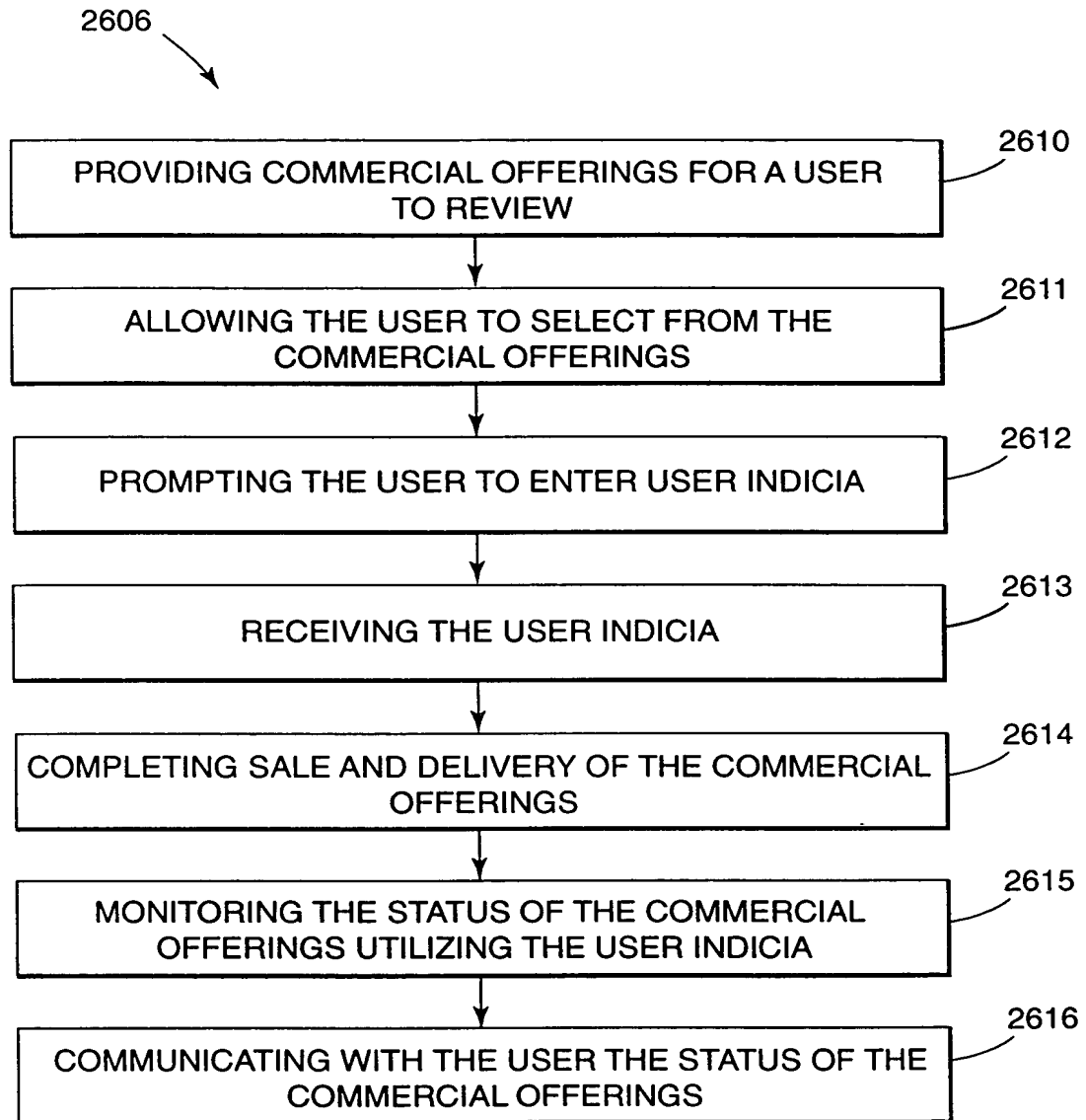


Fig. 87

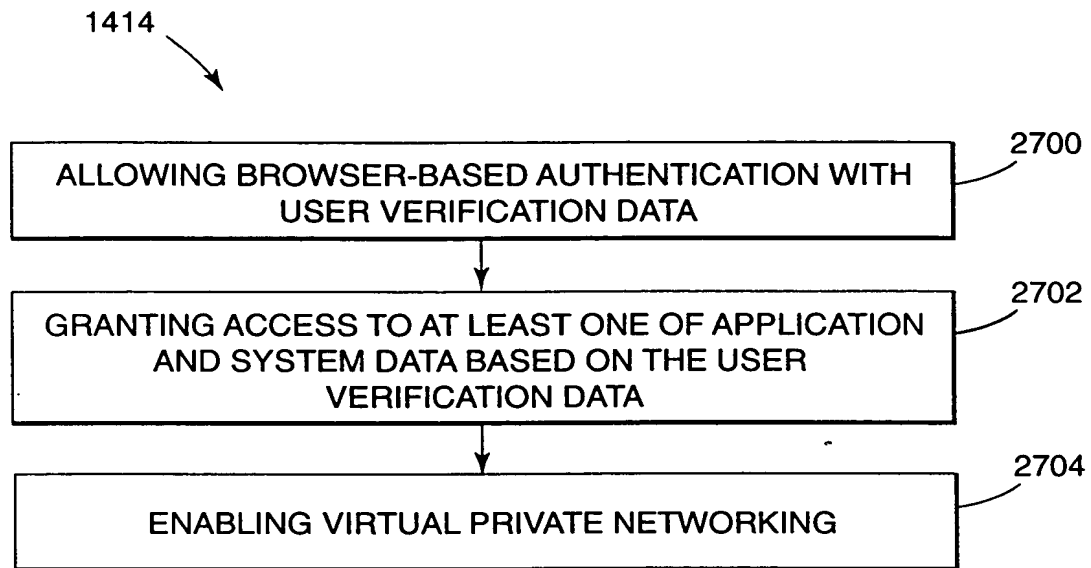


Fig. 88

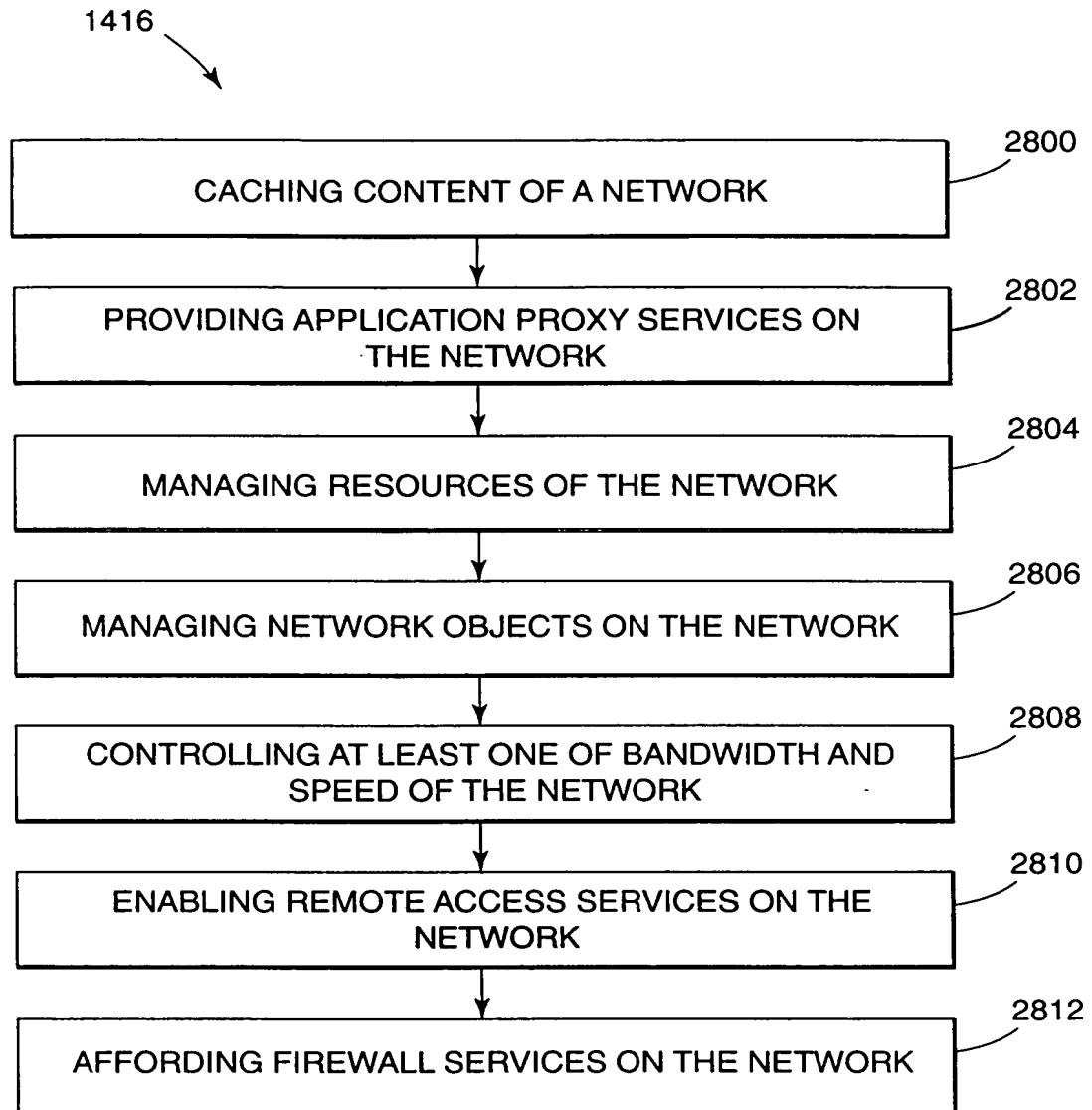


Fig. 89

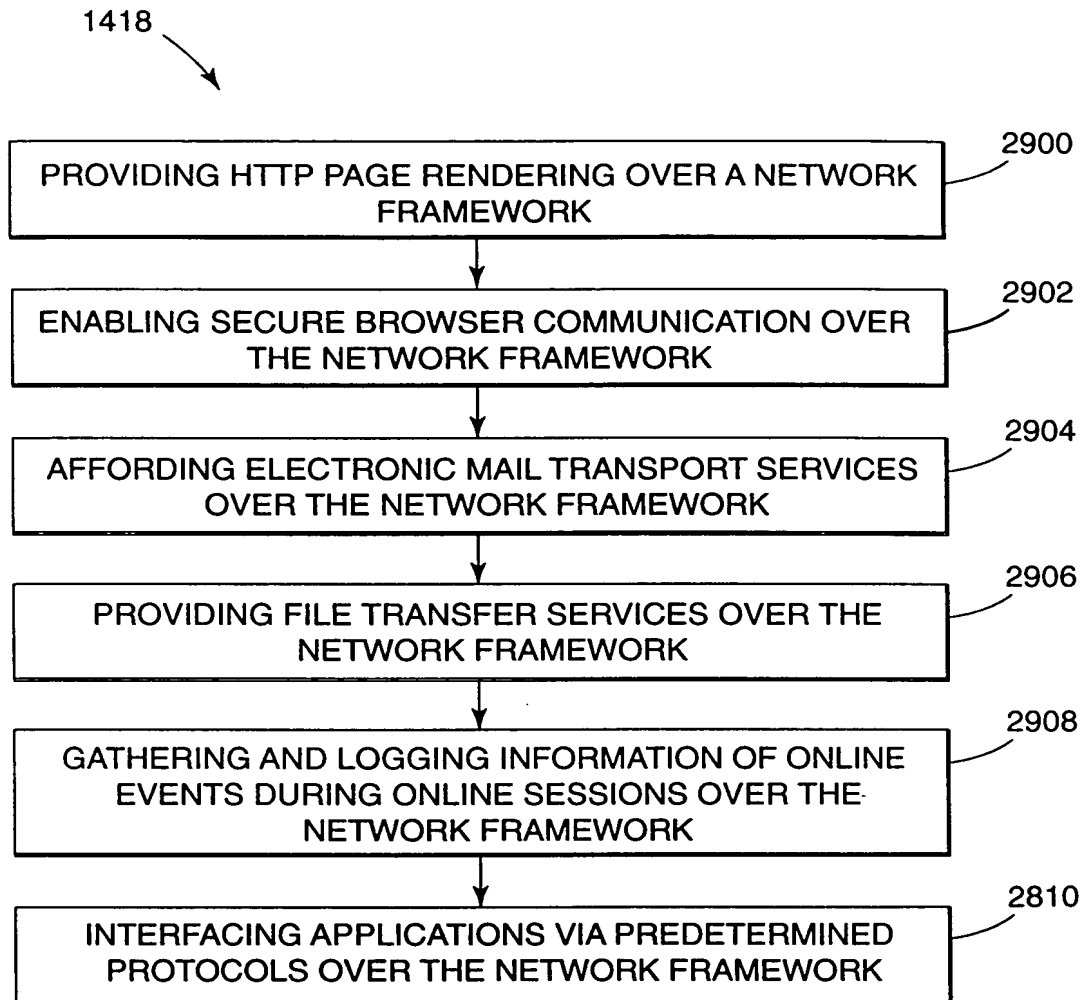


Fig. 90

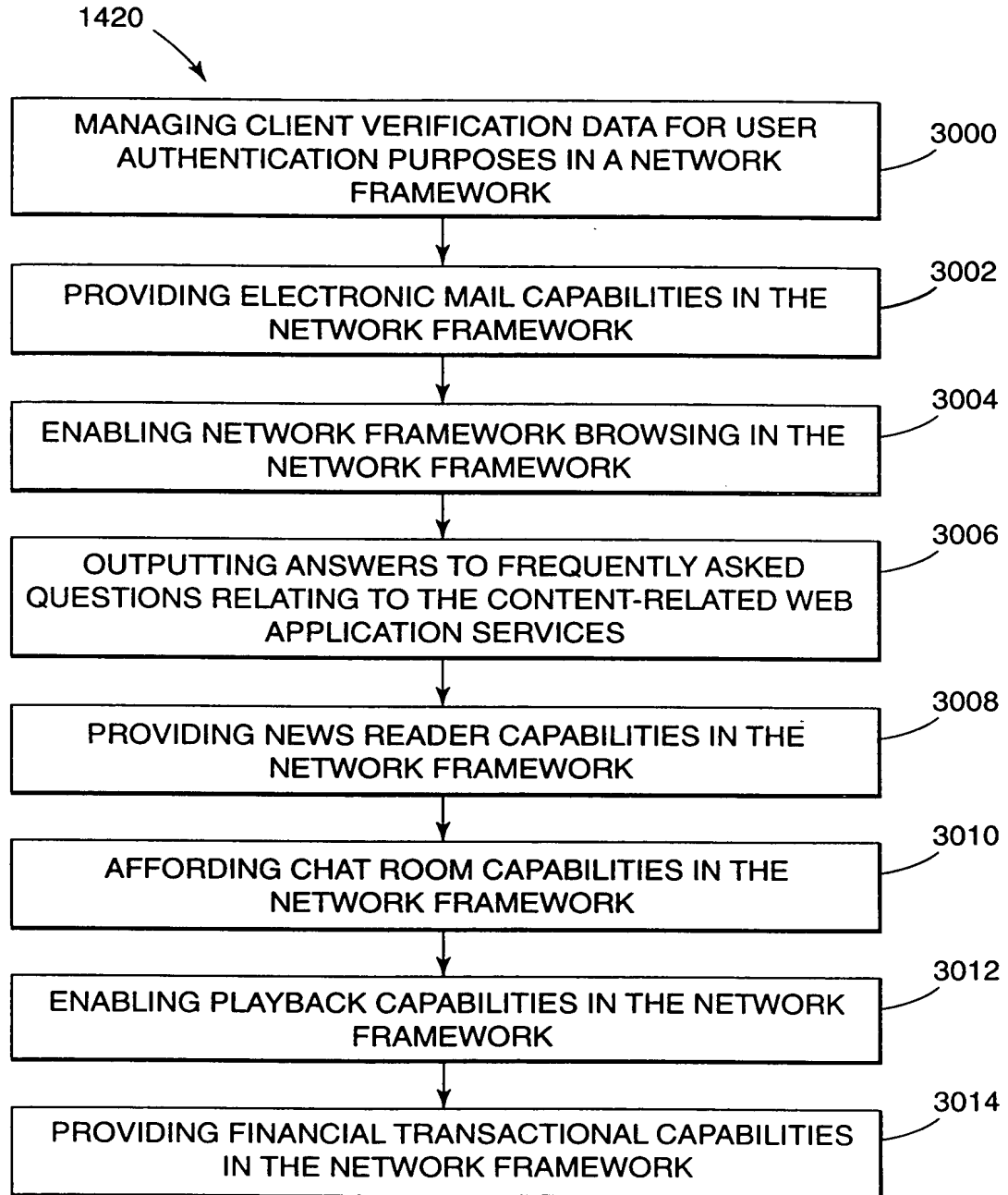


Fig. 91

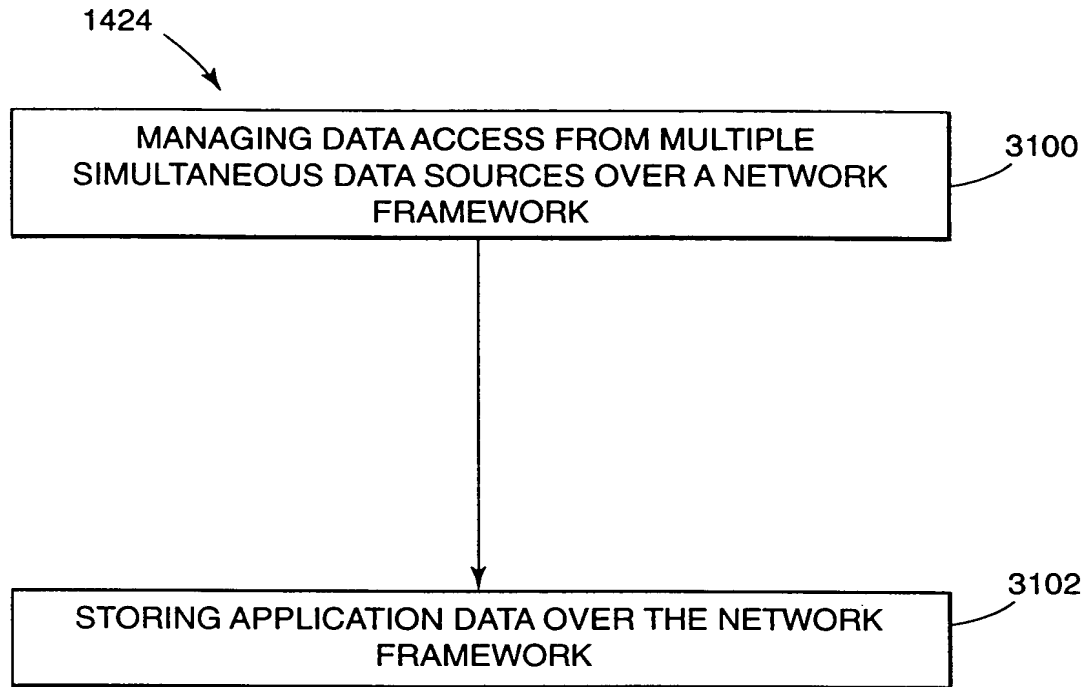


Fig. 92

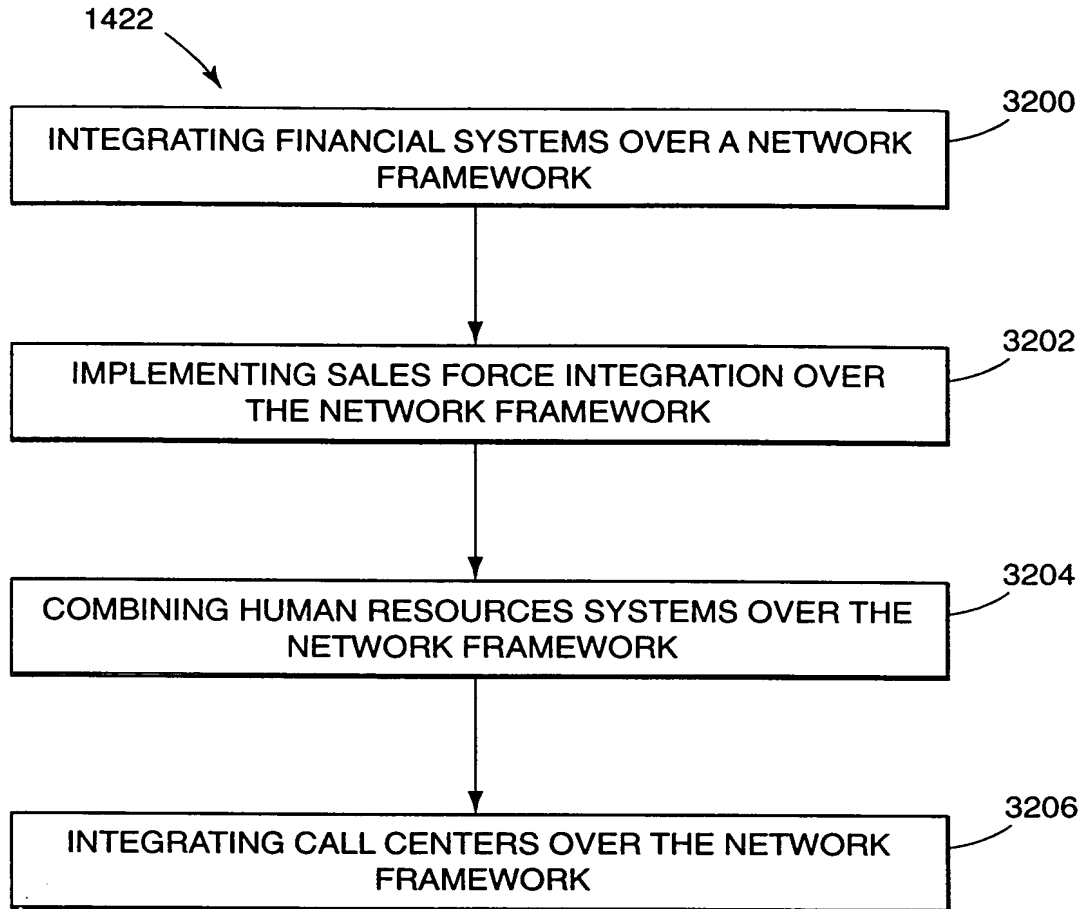


Fig. 93

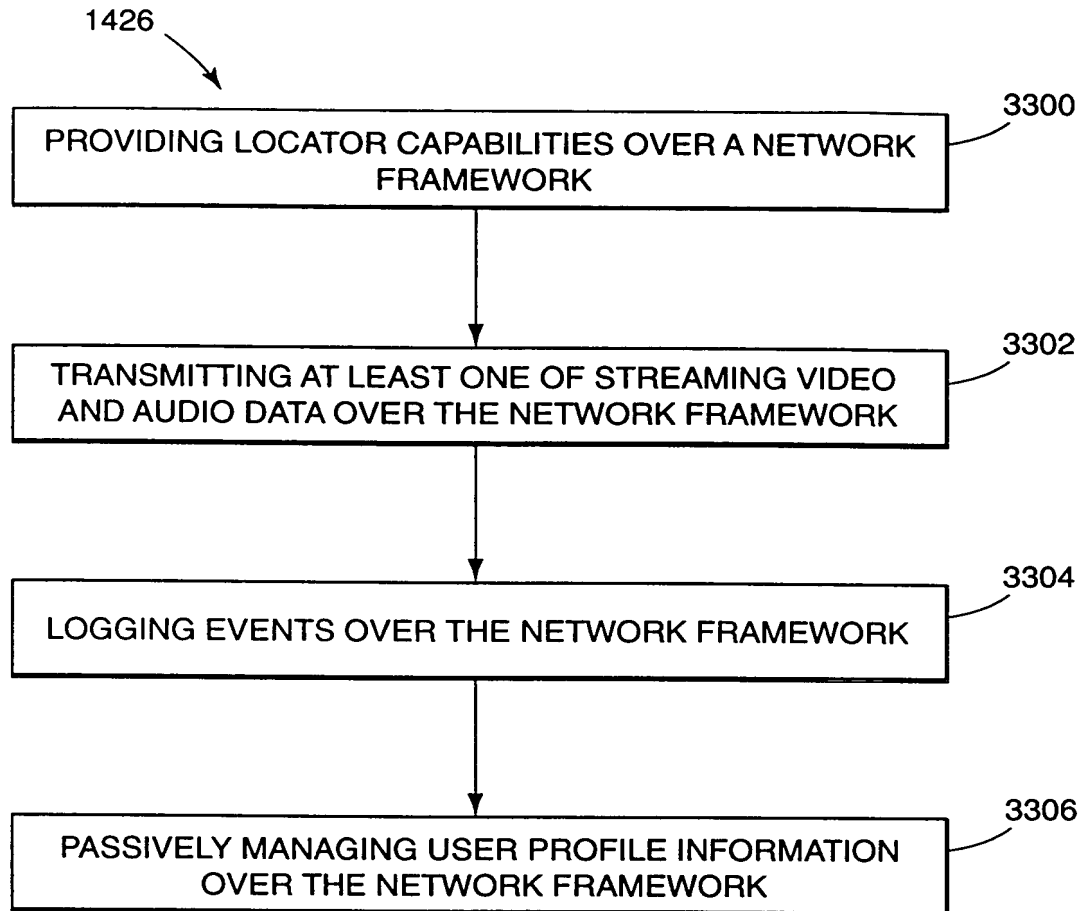


Fig. 94

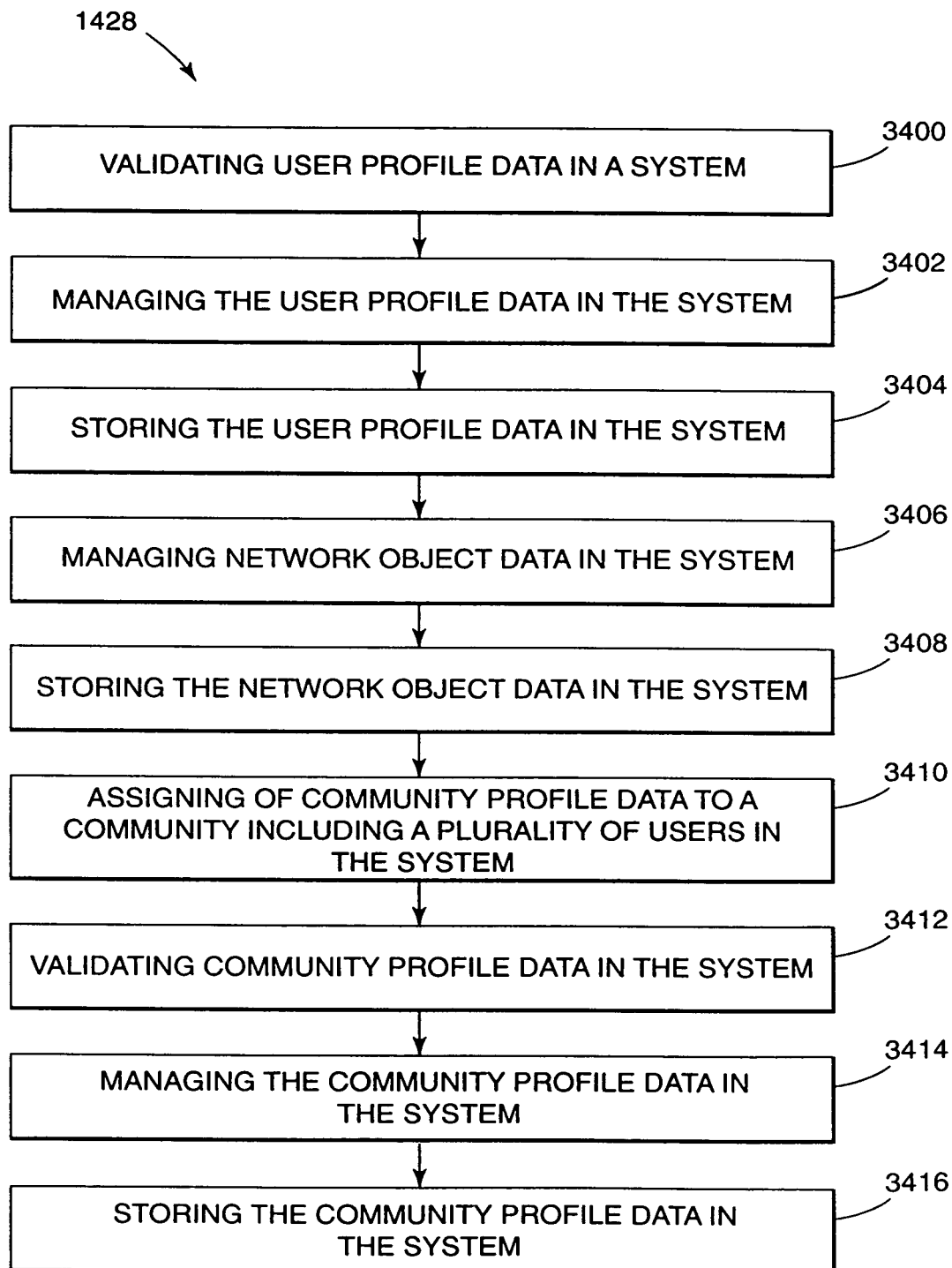


Fig. 95

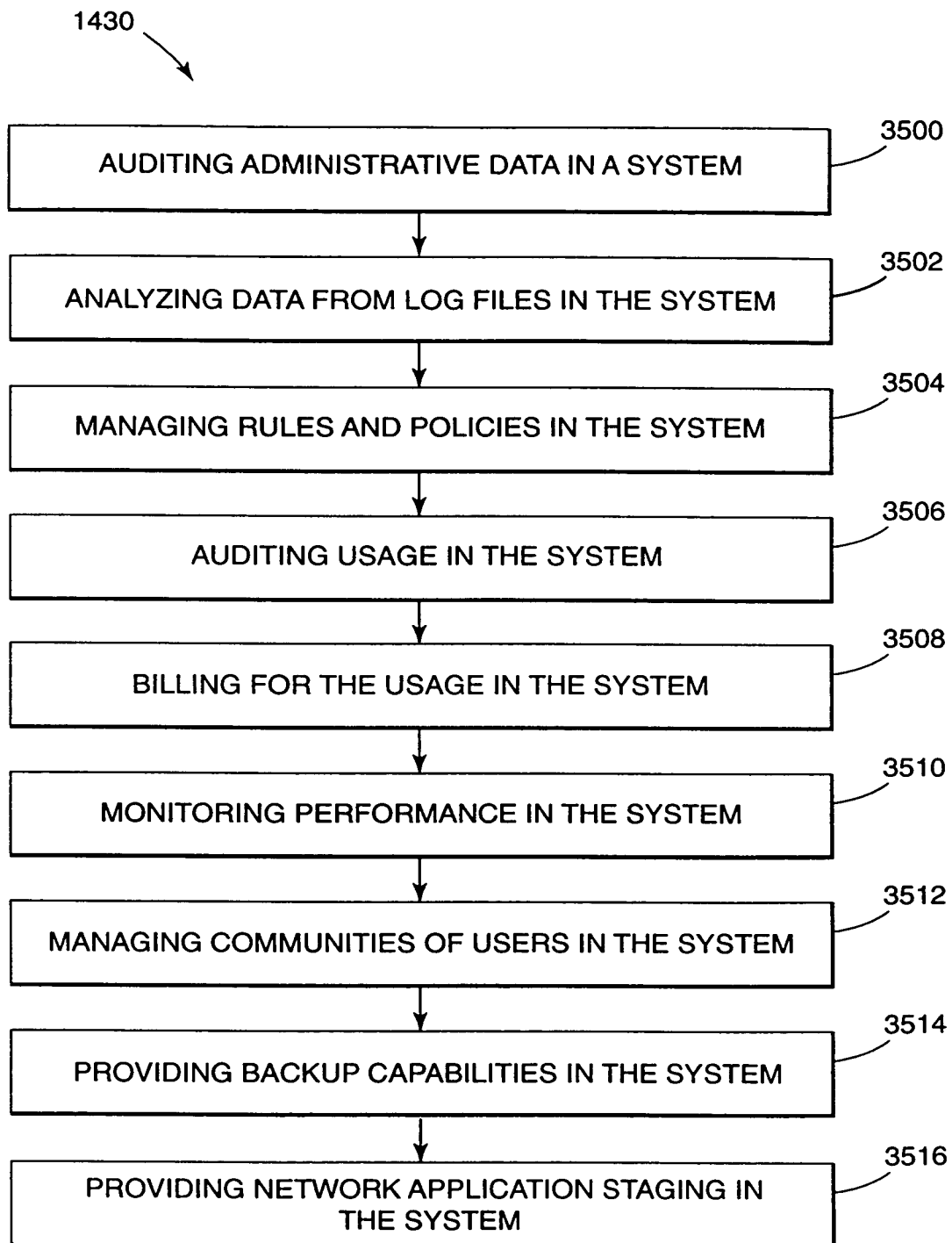


Fig. 96

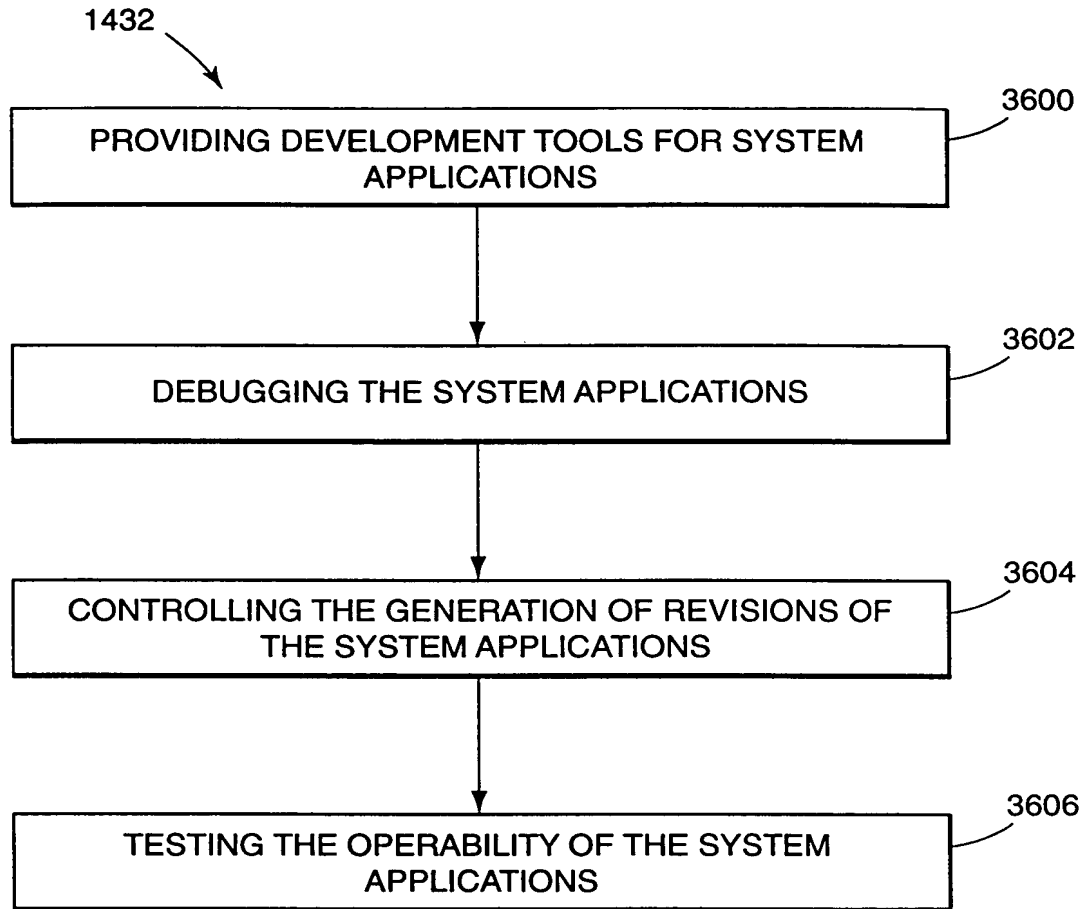


Fig. 97